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IN THE

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Supreme Court of the United States

OCTOBER TERM, 1976

No. 76-781

EXXON CORPORATION AND SHELL OIL COMPANY, Petitioners.

ENVIRONMENTAL PROTECTION AGENCY, an independent agency of the Executive Branch of the United States; Russell E. Train, Administrator of the Environmental Protection Agency; and John QUARLES, Deputy Administrator of the Environmental Protection Agency, Respondents.

PETITION FOR A WRIT OF CERTIORARI TO THE UNITED STATES COURT OF APPEALS FOR THE TENTH CIRCUIT

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December 9, 1976

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No. ——

EXXON CORPORATION AND SHELL OIL COMPANY, Petitioners,

V.

Environmental Protection Agency, an independent agency of the Executive Branch of the United States; Russell E. Train, Administrator of the Environmental Protection Agency; and John Quarles, Deputy Administrator of the Environmental Protection Agency, Respondents.

PETITION FOR A WRIT OF CERTIORARI TO THE UNITED STATES COURT OF APPEALS FOR THE TENTH CIRCUIT

Exxon Corporation and Shell Oil Company petition for a Writ of Certiorari to review the decision and judgment of the Tenth Circuit Court of Appeals in the consolidated cases of American Petroleum Institute, et al. v. Environmental Protection Agency, et al., Nos. 74-1465, 74-1466, Shell Oil Company v. Environmental Protection Agency, et al., No. 74-1621, and

Exxon Corporation v. Environmental Protection Agency, et al., No. 74-1622.1

OPINIONS BELOW

The opinion of the court of appeals (App. A, infra) is reported at 540 F.2d 1023 (10th Cir. 1976).

JURISDICTION

The judgment of the court of appeals was entered on August 11, 1976. On November 1, 1976, an extension of the time within which to file this petition for Writ of Certiorari was granted to and including December 9, 1976. The jurisdiction of this Court is invoked under 28 U.S.C. § 1254(1).

QUESTIONS PRESENTED

The questions presented for review by this Court are:

1. Whether the Administrator of the Environmental Protection Agency complied with Section 304(b) of the Federal Water Pollution Control Act Amendments of 1972 when he promulgated socalled "effluent limitations guidelines" as single-number discharge standards to be "mechanically cranked" into individual permits for more than 200 existing petroleum refineries.

- 2. Whether the Administrator of the Environmental Protection Agency complied with the Federal Water Pollution Control Act Amendments of 1972 when, in lieu of the "guidelines for effluent limitations" required by Section 304(b), he promulgated a so-called "variance clause" which provides far less individual plant flexibility than Congress intended in the Section 402 permit-issuing process.
- 3. Whether the Court of Appeals erred in upholding EPA regulations which disadvantage refineries with petrochemical facilities vis-a-vis their competitors in the refining and organic chemical industries on the sole ground that "nothing in the [Federal Water Pollution Control | Act or its legislative history . . . requires EPA to consider the competitive effect of its regulations."

STATUTES AND REGULATIONS INVOLVED

This petition involves interpretation of EPA's socalled "effluent limitation guidelines" for existing petroleum refineries, 40 Fed. Reg. 21939 (1975), codified at 40 C.F.R. Part 419, as promulgated pursuant to the Federal Pollution Control Act, as amended, 33 U.S.C. §§ 1251 et seq.2 Pertinent provisions of the Act and regulations are set forth in Appendices B and C, pps. 31a and 58a, infra.

¹ Shell and Exxon originally filed separate petitions for review in the Fifth Circuit Court of Appeals. These petitions, Shell Oil Co. v. EPA, and Exxon Corp. v. EPA, were subsequently transferred to the Tenth Circuit and consolidated with API v. EPA. challenging the same set of EPA regulations.

² Parallel United States Code citations for the sections of the Act most frequently cited in this petition are:

Section 101-33 U.S.C. § 1251

Section 301-33 U.S.C. § 1311

Section 304-33 U.S.C. § 1314

Section 306-33 U.S.C. § 1316

Section 402-33 U.S.C. § 1342

STATEMENT OF THE CASE

The 1972 Amendments to the Federal Water Pollution Control Act ("the Act") established a comprehensive program to control water pollution through regulation of industrial discharges. The Act's ultimate goal as set forth in § 101(a)(1) is "that the discharge of pollutants into the navigable waters be eliminated by 1985."

To achieve this long-range objective, Congress established a pragmatic program to upgrade the pollution control capabilities of varying existing plants on an orderly and equitable basis.

First, the Act declares unlawful the discharge of any pollutant except in compliance with conditions imposed by the Act. § 301(a). For existing plants, Congress established goals for effluent limitations to be achieved through permits calling for "application of the best practicable control technology currently available" by July 1, 1977, and "application of the best available technology economically achievable" by July 1, 1983. §§ 301(b)(1)(A) & 301(b)(2)(A).

These goals are to be achieved in accordance with "guidelines for effluent limitations" published by the Administrator of EPA. § 304(b). Such guidelines are to identify, "the degree of effluent reduction attainable" and to "specify factors to be taken into account" in determining control measures and practices to be applicable to point sources. § 304(b).

Among the factors to be specified by EPA are "age of equipment and facilities involved, the process employed, the engineering aspects of the application of various types of control techniques, process changes, the cost of achieving such effluent reduction, non-water quality environmental impact (including energy requirements), and such other factors as the Administrator deems appropriate." § 304(b). The resulting "guidelines for effluent limitations" are then to be used in formulating individual plant discharge permits under the National Pollutant Discharge Elimination System, to be administered principally by the States. § 402(b).

Pursuant to its purported authority under §§ 301, 304 and 306 of the Act, EPA, on May 9, 1974, published regulations establishing so-called "effluent limitations guidelines" for the petroleum refining industry. 39 Fed. Reg. 16560. Amended regulations, substantially unchanged from those previously promulgated, were published by EPA on May 20, 1975. 40 Fed. Reg. 21939.

Rather than providing the flexibility inherent in the § 304 guidelines described above, EPA's effluent limitations guidelines" for petroleum refineries establish single-number discharge standards for all existing plants directly comparable in form and format to the "standards" which Congress expressly prescribed in § 306 only for new sources. Indeed, "effluent limitations guidelines" were designed to be "mechanically cranked" into permits issued by State authorities without regard to varying circumstances of individual existing refineries.

Having thus stripped the States of any significant role in the permit-issuing process, EPA proceeded to simulate individual plant flexibility through promulgation of a "variance clause" by which exceptions might theoretically be granted in unusual cases. Such a variance would be granted only if the discharger proves "that factors relating to the equipment or facilities involved, the process relating to the equipment or facilities involved, the process applied, or other such factors related to such discharger are fundamentally different from the factors considered in the establishment of the guidelines." 40 C.F.R. § 419.12.

In addition, EPA's regulations anomalously provided discharge limits which penalize refiners engaged in substantial organic chemicals production. In contrast to analogous regulations for the organic chemicals industry, which recognize and reflect the pollutant contribution of chemicals production, EPA's petrochemical and integrated petroleum refining regulations actually reduce the discharge allowable to refineries engaged in significant manufacture of organic chemicals. These more stringent discharge restrictions significantly disadvantage such refiners as compared with their competitors in the refining and organic chemicals industries.

Because of these and other defects in EPA's regulations, Exxon, Shell and other refiners petitioned for review of EPA's petroleum refinery "effluent limitations guidelines" under §509(b)(1)(E) of the Act.

The Tenth Circuit decided petitioners' case on August 11, 1976, holding inter alia that:

- (1) Despite the absence of any provision in §301 for issuing regulations, EPA's "promulgation of the limitations was a reasonable exercise of a congressionally delegated power," creating limitations that are "presumptively applicable and controlling unless rebutted by a permit applicant." 540 F.2d at 1030. Further, despite the §304 direction to establish guidelines, the Tenth Circuit held that "[t]he expertise of the Administrator is persuasive as to whether the limitations be fixed in single numbers or ranges." 540 F.2d at 1031.
- (2) Despite the requirement that a variance will be granted only upon proof by the discharger of "fundamentally different factors," the "variance" clause was held to be a "valid exercise of EPA's rule-making authority." 540 F.2d at 1033.
- (3) Despite the conceded penalty for refineries engaged in petrochemical and integrated operations, EPA's regulations were upheld on the ground that

⁸ All emphases added in this petition unless otherwise noted.

^{*}The variance provisions for the petroleum refining industry in 40 C.F.R. §§ 419.12, 419.22, 419.32, 419.42 and 419.52 are essentially identical to the variance provisions promulgated by EPA for all industry categories and subcategories. See App. C, page 58a, infra.

⁵ EPA's regulations for the petroleum refining industry include five subparts; subpart C, 40 C.F.R. §§ 419.30-419.36, is applicable to petrochemical refineries; subpart E, 40 C.F.R. §§ 419.50-419.56, is applicable to more complex integrated refineries with substantial organic chemicals production. EPA's regulations for the organic chemical industry, 40 C.F.R. § 414, although presently subject to reconsideration by EPA, are nonetheless still used for guidance in issuing permits.

⁶ Petitioners also filed a protective complaint, under the Administrative Procedure Act, in the United States District Court for the District of Colorado. The District Court dismissed the complaint on April 8, 1975, holding that "the issues presented in this case are properly considered in the appropriate United States Court of Appeals pursuant to § 509(b) of the Act." American Petroleum Institute v. Train, 7 ERC 1795, 1797 (D. Col. 1975), aff'd 526 F.2d 1343 (10th Cir. 1975). The jurisdictional issue involved in API v. Train is not raised in this petition for certiorari and was not reconsidered in American Petroleum Institute v. EPA, 540 F.2d at 1026. See n.1, supra.

"nothing in the Act or its legislative history . . . requires EPA to consider the competitive effect of its regulations." 540 F.2d at 1036.

REASONS FOR GRANTING THE WRIT

I. A CONFLICT EXISTS AMONG THE CIRCUITS RE-GARDING WHETHER EPA'S "EFFLUENT LIMITA-TIONS GUIDELINES" COMPLY WITH SECTION 304(b) OF THE ACT.

On April 19 and June 21, 1976, this Court granted the petitions and cross-petition in E. I. duPont de-Nemours and Co., et al. v. Train, et al., Nos. 75-978, 75-1473 and 75-1750, agreeing to review, inter alia, whether the Administrator of EPA may promulgate effluent limitations for existing industrial sources of water pollution, uniform within industrial classes, categories and subcategories, as national minimum requirements under § 301 of the Federal Water Pollution Control Act Amendments of 1972.

The duPont petitions raise this question in the context of EPA regulations for the inorganic chemical industry. The present petition raises a comparable issue with respect to the petroleum refining industry. The duPont cases were fully briefed and oral argument was held on December 8, 1976. Because of the similarity of the issues presented, this Court may wish to postpone its consideration of this portion of the instant petition pending disposition of the duPont cases.

The question of whether EPA has authority under the Act to issue so-called "effluent limitations guidelines" as single-number discharge standards has already been considered by seven courts of appeals. The courts have split a number of ways in interpreting EPA's authority. The first court to speak, the Eighth Circuit, held that the Act does not empower EPA's Administrator to promulgate effluent limitations for existing plants under § 301. CPC International Inc. v. Train, 515 F.2d 1032 (8th Cir. 1975). Reviewing the statutory language and legislative history, the Eighth Circuit determined that § 301 does not authorize promulgation of effluent limitations by regulation, but rather that "guidelines for effluent limitations," not single-number standards, were explicitly required by § 304. 515 F.2d at 1037.

Other courts of appeals presented with the same issue in the context of similar regulations for other industries have disagreed.

The Third Circuit, in American Iron and Steel Institute v. EPA, 526 F.2d 1027 (1975), found that authority for the Administrator to issue single-number limitations under § 301 could be "inferred" from the Act. 526 F.2d at 1037. The Third Circuit reconciled this holding with the explicit § 304 requirement for guidelines in the following manner:

[T]he section 301 limitations represent both the base level or minimum degree of effluent control permissible and the ceiling (or maximum of effluent discharge) permissible nationwide within a given category, and the section 304 guidelines are intended to provide precise guidance to the permit-issuing authorities in establishing a permissible level of discharge that is more stringent than the ceiling. 526 F.2d at 1045.

Because EPA's "effluent limitations guidelines" for the iron and steel industry failed to identify a range of feasible discharge levels and specify factors to be taken into account for granting permits to individual point sources, as required by § 304, the Third Circuit remanded to EPA. 526 F.2d at 1045-47.

In the present case, and in E. I. duPont de Nemours & Co. v. Train, 541 F.2d 1018 (4th Cir. 1976), the Tenth and Fourth Circuits found promulgation of limitations under § 301 to be a reasonable exercise of the EPA Administrator's authority. Both courts found EPA's limitations to be "presumptively applicable and controlling unless rebutted by a permit applicant," and accordingly upheld EPA's single-number effluent limitations despite the § 304 requirement that EPA publish "regulations providing guidelines for effluent limitations." API, supra, 540 F.2d at 1030; duPont, supra, 541 F.2d at 1028.

The Fourth Circuit in duPont ruled that "the expertise of the Administrator is persuasive as to whether the limitations be fixed in single numbers or ranges," 541 F.2d at 1029, and the Tenth Circuit agreed explicitly. 540 F.2d at 1031. The Tenth Circuit rejected, however, EPA's claim "that the regulations must be mechanically cranked into every permit which may be issued," stressing that its holding accepted the use of single numbers only "[f]or the purpose of general rule-making." 540 F.2d at 1031-32."

This split among the circuits that have considered whether EPA's single-number discharge standards comply with the requirements of § 304(b) presents serious obstacles to effective administration of the Act. Indeed, the current uncertainty regarding EPA's authority and compliance with the Act continues to impose burdens on the courts and promotes chaotic administration of the nation's water pollution control program.

By promulgating single-number standards for existing plants instead of issuing the flexible "guidelines" required by § 304(b), EPA's procrustean regulations ignore significant factors that Congress intended to be applied in granting individual discharge permits. This EPA disregard of Congress' intent has spawned litigation in countless industries challenging EPA's regulations.

In addition, administration of the Act's pollution control program has been made chaotic by EPA's severe curtailment of the primary State role contemplated by the Act. Congress intended that discharge permits be issued by the States, rather than EPA, as soon as they have the "capability," under § 402(a)(5). Without "meaningful local and State participation," Congress recognized that "the program will founder on the rocks of the generally inflexible, Washington dictated approach." Rather than being given the "guidelines for effluent limitations," explicitly called for by § 304, the States must now mechanically crank

⁷ The Seventh Circuit also found authority for EPA to issue effluent limitations under § 301, but expressly avoided ruling regarding whether EPA's regulations comport with the requirements of § 304. American Meat Institute v. EPA, 526 F.2d 442, 448 n. 13, 452 (7th Cir. 1975).

The Second Circuit upheld EPA's promulgation of "effluent limitation guidelines" pursuant to §§ 301 and 304 of the Act. Hooker Chemicals v. Train, 537 F.2d 620, 628 (2d Cir. 1976). Accord, American Frozen Food Institute v. Train, 539 F.2d 107, 129-32 (D.C. Cir. 1976).

⁸ Comments of Congressman Blatnik, spokesman for the House Public Works Committee in the House debate on the Act, as reprinted in Senate Comm. on Public Works, 1 A Legislative History of the Water Pollution Control Act Amendments of 1972, at 355, 93d Cong., 1st Sess. (Jan. 1973) (Comm Print).

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EPA's made-in-Washington, single-number limitations into each permit. In short, the dangers Congress sought to avoid have come to pass.

EPA's failure to follow the statutory scheme thus severely inhibits achievement of the congressional plan that the States play the "primary" role in the discharge permit program, and that flexibility be provided to account for the varying circumstances of individual existing plants. Only through review by this Court will the nation be guaranteed the benefits of Congress' carefully designed plan for elimination of all pollutant discharges by 1985.

II. A CONFLICT EXISTS AMONG THE CIRCUITS RE-GARDING THE VALIDITY OF EPA'S "VARIANCE CLAUSE."

The courts of appeals have also split regarding the validity of the "variance clause," which EPA issued in substitution for the individual plant flexibility intended by Congress in the § 304(b) "guidelines for effluent limitations." Since this split among the circuits did not arise until after the *duPont* decision, certiorari has not yet been granted on this question.

The Third Circuit, the first court of appeals to speak on this issue, found that "the variance procedure provides for less flexibility than we believe Congress contemplated, since it permits deviations from otherwise rigid and unitary limitations only where the circumstances of the particular plant are 'fundamentally different' than those from which the effluent limitation was derived." American Iron and Steel Institute v. EPA, supra, 526 F.2d at 1046. The court did not rule explicitly on the validity of the variance provision, as it remanded all of the 1977 and 1983 regulations for

the iron and steel industry on the grounds that EPA failed to provide the required § 304(b) guidelines. 526 F.2d at 1047.

The *duPont* decision found the variance clause to be "appropriate to the regulatory process" and thus "presumptively applicable." *duPont*, *supra*, 541 F.2d at 1028. However, the court did not rule on its ultimate reasonableness, stating:

The administration of these provisions in practice is a matter of speculation at the present. The question will arise when a claim for a variance is made in a permit application. 541 F.2d at 1028.

Following du Pont, the Second Circuit agreed that "[i]t would be premature at this point to consider whether the variance clause will be interpreted with sufficient liberality to accommodate all legitimate demands for flexibility." Natural Resources Defense Council v. EPA, 537 F.2d 642, 647 (1976).

A direct conflict among the circuits arose for the first time when the Fourth Circuit, in Appalachian Power Co. v. Train, 9 ERC 1033 (1976), invalidated a variance clause for the steam electric power industry identical to those considered in the previously decided cases. The Court found the variance clause to be unduly restrictive because it takes into account "only technical and engineering factors, exclusive of cost," and therefore conflicts with the flexibility required by the Act. Accordingly, the Court of Appeals set aside and remanded variance provisions identical to those in the instant case. 9 ERC at 1038.

Ruling after Appalachian Power, the Tenth Circuit, in API, returned to the rationale of the previous deci-

sions. The court found that the variance provisions constituted reasonable general rulemaking although it was too early to assess their validity in operation: "Their interpretation and application must await action on a variance claim asserting specific facts. We will not speculate what the result may be." *API*, supra, 540 F.2d at 1033.

In so holding, the Tenth Circuit noted: "Again we have an area of uncertainty. There is not only a conflict between circuits but also a conflict within one circuit [i.e., the Fourth, between duPont and Appalachian Power]." 540 F.2d at 1032.

The unsettled law on the variance clause has led to great uncertainty among industrial dischargers and threatens to spawn needless litigation in thousands of individual permit application proceedings. Although several circuits have found the variance provision's unduly restrictive requirement of "fundamentally different" factors inconsistent with Congress' intent, only one circuit, the Fourth, in Appalachian Power, has explicitly invalidated the provision and remanded to EPA.

The inappropriateness of EPA's variance clause is apparent from EPA's own regulations. In the face of the § 304 requirement for flexible guidelines, EPA issued single-number limitations. In an attempt to simulate individual plant flexibility where none actually exists, EPA added the variance clause. By its terms, the clause would permit an exception only for factors "fundamentally different from the factors considered in the establishment of the guidelines." 40 C.F.R. § 419.12, et al. Since EPA purported to consider even site-specific factors such as plant age,

size, processes and the like in development of its "effluent limitations guidelines," few, if any, circumstances exist in which an exception would be granted under EPA's clause.

In fact, as far as petitioners are aware, although numerous variances have been requested, none has been granted to any of the nation's more than two hundred petroleum refineries. Nor are petitioners aware of requested variances being granted in any other industry.

So long as EPA's restrictive "variance clause" remains in force, permit-issuing authorities will be deprived of discretion to resolve the vast majority of disputed permits. Once the administrative process is concluded, individual plants denied permits adapted to their specific circumstances will be left with no choice but to appeal to the appropriate court of appeals under § 509(b)(1) of the Act.

In sum, although a conflict among the circuits admittedly exists on the validity of EPA's variance clause, certiorari has not yet been granted on this issue, and it is not before this Court in the duPont cases. Further postponement of a definitive resolution of this critical question can only lead to needless litigation and further delay in implementation of the Act's water pollution control program.

III. RESOLUTION OF WHETHER EPA MUST CONSIDER THE COMPETITIVE EFFECT OF ITS REGULATIONS IS NECESSARY TO AVOID DISCRIMINATORY IMPLEMENTATION OF THE FEDERAL WATER POLLUTION CONTROL ACT.

Another question of far-reaching significance for EPA's administration of not only § 304, but of other provisions of the Act, is the Tenth Circuit's holding

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that "nothing in the Act or its legislative history . . . requires EPA to consider the competitive effect of its regulations." API, supra, 540 F.2d at 1036. Without plenary consideration and reversal by this Court, the Tenth Circuit's ruling on this point will allow EPA to ignore the Act as well as established administrative law principles which require it to consider the impact of its actions on competition among firms and industries which it regulates.

EPA acknowledges that the manufacture of organic chemicals increases the amount of pollutants in a plant's discharge. This fact is apparent not only in EPA's "effluent limitations guidelines" for the organic chemicals industry, but also in numerous permits for organic chemicals plants which provide effluent limitations reflecting allowances for the pollutants generated by organic chemical processes in such plants."

Nonetheless, when EPA promulgated regulations applicable to the identical organic chemical processes in petrochemical and integrated refineries, it made no comparable allowance for the pollutant loadings created by such chemical processes. 40 C.F.R. §§ 419.30-419.36 and 419.50-419.56. Indeed, EPA's

regulations for petrochemical and integrated refineries penalize such refineries by granting them smaller discharge allowances than the same refineries would have without the additional organic chemical facilities.

Consequently, petitioners generally challenged the underlying methodology and derivation of EPA's regulations, as well as EPA's specific failure to give any credit to the calculated discharge levels for petrochemical, hydrotreating, and other processes which contribute substantially to raw waste loading and effluent discharge.¹⁰

The inherent unfairness and resulting competitive disadvantage of EPA's petrochemical and integrated refining regulations is dramatically illustrated by Shell Oil Company's Martinez, California, manufacturing complex, a refinery and chemical plant with common treatment facilities. The Martinez refinery is (i) allowed to discharge little more than half the pollutants allowable to a comparable refinery with an organic chemicals plant having separate treatment facilities and (ii) is actually penalized in terms of allowable discharge for having added organic chemical processes to the refinery by being granted smaller effluent allowances than it would be allowed without such processes."

The Tenth Circuit suggested that petitioners' claims have a "hollow ring" since EPA's regulations for the organic chemicals industry were remanded put and to a stipulation among the parties in Union Carbide Co.p. v. Train, No. 74-1459 (4th Cir. 1976). API, supra, 540 F.2d at 1036. However, regardless of what regulations eventually are promulgated for the organic chemicals industry, such regulations will, like the dozens of chemical plant permits already issued, undoubtedly provide allowances for pollutants created and discharged as a result of organic chemical processes.

¹⁰ Petitioners' challenge below to EPA's entire methodology for deriving its "effluent limitations guidelines" refutes the Tenth Circuit's erroneous remark that "the refineries do not contest the methodology, the data base, or the achievability of the limitations for the two [petrochemical] subcategories in question." 540 F.2d at 1037. The regulations' failure to grant any credit for most chemical processes in petrochemical and integrated refineries was but one of the many anomalies created by the EPA methodology which petitioners vigorously challenged.

¹¹ Since it is classified by EPA as a subcategory E integrated refinery, the Martinez complex may not discharge in excess of 1733.5 pounds of BOD per day, whereas a subcategory D refinery of the *same* capacity as Shell Martinez may discharge

Shell's Martinez complex is not the only example of this discriminatory impact. Other petrochemical and integrated refineries are subject to comparable treatment, which inevitably places them at a disadvantage vis-a-vis competitors in the refining and organic chemical industries.¹²

EPA argued that it would be "absurd" to consider such economic effects (40 Fed. Reg. at 21949), and the Tenth Circuit agreed that EPA may ignore "the competitive effect of its regulations." API, supra, 540 F.2d at 1036. Under these circumstances, a definitive decision by this Court is necessary to correct EPA's cramped interpretation and to assure in the future that EPA will exercise its statutory responsibility to reconcile the environmental, economic and competitive effects of its regulations.

The requirement that EPA consider the competitive effect of its regulations is apparent from the statutory text which repeatedly stresses the importance of economic factors. For example, § 301 requires application of the "best practicable" control technology by 1977 and the "best available technology economically achievable" by 1983. Similarly, § 304 lists the "total"

cost of application of technology in relation to the effluent reduction benefits to be achieved" as one of the factors to be considered in the guidelines.

Despite this statutory requirement that EPA consider economic factors including the "total cost" of its regulations, the Tenth Circuit failed to give any weight to the potentially significant economic consequences which might result from EPA's failure to examine either intra-industry or inter-industry competitive effects. This ruling conflicts, not only with the statute, but also with the holdings of other courts of appeals in similar environmental cases.

For example, the D.C. Circuit remanded asbestos dust standards under the Occupational Safety and Health Act for consideration of inter-industry economic differences. Industrial Union Dep't., AFL-CIO v. Hodgson, 499 F.2d 467, 479-81 (D.C. Cir. 1974). In so doing, the Court stressed that, where "two industries were in competition with one another", and "one industry could gain a competitive advantage over another by virtue of differing standards, employers in the disadvantaged industry [may] challenge the standards on a comparative basis "499 F.2d at 481.

Similarly, in Portland Cement Ass'n v. Ruckelshaus, 486 F.2d 375, 390 (D.C. Cir. 1973), cert. denied, 417 U.S. 921 (1974), the D.C. Circuit found that Congress' direction that EPA consider "economic cost" under the Clean Air Act, means that "[t]here is, of course, a significant and proper scope for inter-industry comparison in the case of industries producing substitute or alternative products."

Wholly apart from these environmental law precedents, the requirement that administrative agencies

²⁰¹² pounds of BOD per day. Moreover, separate "D" refinery and organic chemical plants cumulatively the same size as Martinez would be allowed a total discharge of 3135 pounds per day, well above Martinez's 1733.5 allowance. 40 C.F.R.. §§ 419.42 & 419.52.

¹² For example, petitioners have calculated that if five of the existing nine subcategory D refineries were to expand petrochemical facilities and become classified in subcategory E, allocations would decrease an average of 16%. On the other hand, subcategory E refineries would gain an average of 18% in their allocation if they were to close down petrochemical operations and apply under the subcategory D allocation.

consider competitive factors relating to cost, or more generally to the "public interest," is well-established. For instance, in Gulf States Utilities Co. v. FPC, 411 U.S. 747 (1973), this Court told the Federal Power Commission that its duties under § 204 of the Federal Power Act, 16 U.S.C. § 824c, when approving issuance of utility securities under a "public interest" standard, included consideration of arguments that such securities would be used to refinance existing anticompetitive activities.

Likewise, the D.C. Circuit required the SEC to take competitive considerations into account in authorizing utility acquisitions under the "public interest" standard of § 10(e) of the Public Utility Holding Company Act of 1935, 15 U.S.C. § 79j(e). In so holding, the court interpreted the "public interest" as requiring SEC consideration not only of whether acquisition of two nuclear power plants by a group of New England utilities would lead to a concentration of control but also of whether the acquisition would preclude competing utilities from purchasing electricity. Municipal Electric Ass'n of Massachusetts v. SEC, 413 F.2d 1052 (D.C. Cir. 1969).

The basic administrative law principle underlying these decisions is also expressed in this Court's rulings granting standing to challenge administrative rulings affecting competitors and permitting intervention to companies in regulatory adjudications against competing firms.¹³ Unless the "public interest" and other com-

parable regulatory mandates require agencies to consider the competitive effect of their actions, it would be a futile gesture to permit competitors to intervene and seek judicial review of administrative determinations.

In sum, the Tenth Circuit's decision sanctioning EPA's failure to consider competitive economic factors conflicts with applicable administrative law principles and will inevitably lead to discriminatory implementation of the Federal Water Pollution Control Act. The need for corrective action by this Court is especially appropriate given the irrational EPA regulations challenged here. By granting a lower allowable discharge to refineries with than without organic chemical processes, EPA's petrochemical and integrated refining regulations are by definition arbitrary, capricious, and appropriate for reversal and remand by this Court.

¹³ This Court held as early as FCC v. Sanders Brothers Radio Station, 309 U.S. 470 (1940), that corporations have judicial standing to challenge administrative agency decisions concerning their competitors. See also Ass'n of Data Processing Serv. Organi-

zations v. Camp, 397 U.S. 150 (1970). Intervention in such situations has been accepted since FCC v. National Broadcasting Co., Inc. (KOA), 319 U.S. 239 (1943); see also National Coal Ass'n v. FPC, 191 F.2d 462, 466-67 (D.C. Cir. 1951); Elm City Broadcasting Corp. v. United States, 235 F.2d 811 (D.C. Cir. 1956).

CONCLUSION

For the foregoing reasons, this Court should grant this petition for certiorari. If the Court should decide to withhold action on Issue I pending disposition of the *duPont* cases, the Court should nonetheless grant certiorari on Issues II and III, neither of which is presented in the *duPont* cases.

Respectfully submitted,

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December 9, 1976

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CERTIFICATE OF SERVICE

I hereby certify that three printed copies of the foregoing Petition for Writ of Certiorari to the United States Court of Appeals for the Tenth Circuit have been mailed this 9th day of December, 1976, postage prepaid to all petitioners below and to:

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APPENDIX

APPENDIX A

American Petroleum Institute et al., Petitioners,

v.

Environmental Protection Agency et al., Respondents.

Nos. 74-1465, 74-1466, 74-1621 and 74-1622

United States Court of Appeals, Tenth Circuit.

Aug. 11, 1976

[540 F.2d 1023]

Before Seth, Breitenstein and Doyle, Circuit Judges. [1026]

Breitenstein, Circuit Judge.

The American Petroleum Institute, an incorporated trade association of companies in the petroleum industry, and ten companies engaged in petroleum refining and related activities, have petitioned for review of regulations promulgated by the Administrator of the Environmental Protection Agency under the Federal Water Pollution Control Act Amendments of 1972. 33 U.S.C. §§ 1251-1376. The regulations are contained in 40 C.F.R. Part 419, Petroleum Refining Point Source Category. The Administrator at times will be referred to as EPA. The statutory references will be those found in the Act as set out in 86 Stat. 816 et seq.¹ Petitioners will be referred to as Refineries.

¹ The parallel U. S. Code citations for the most frequently mentioned sections are:

Section 101-33 U.S.C. § 1251,

Section 301-33 U.S.C. § 1311,

Section 304-33 U.S.C. § 1314,

Section 306-33 U.S.C. § 1316,

Section 402—33 U.S.C. § 1342,

Section 501-33 U.S.C. § 1361,

Section 502—33 U.S.C. § 1362, Section 509—33 U.S.C. § 1369.

Section 509(b)(1)(E) confers jurisdiction on the court of appeals. American Petroleum Institute v. Train, 10 Cir., 526 F.2d 1343, sustains that jurisdiction and will not be reconsidered.

I.

THE ACT

The Act resulted from dissatisfaction with predecessor statutes which relied unsuccessfully on water quality standards as the primary method of pollution control. See S. Rep. No. 92-414, 92 Cong. 2d Sess., 2 U.S. Code Cong. & Adm. News '72 3668, 3674. The objective of the Act "is to restore and maintain the chemical, physical, and biological integrity of the Nation's waters." § 101(a). The goal is the elimination by 1985 of "the discharge of pollutants into the navigable waters.." § 101(a)(1). Section 301(a) provides that "the discharge of any pollutant by any person shall be unlawful" except "as in compliance" with specified sections of the Act. The number of dischargers has been variously estimated from 30,000 to 70,000.

The control is by effluent limitations on discharges from point sources. See § 301. The Act provides progressively severe limitations. By July 1, 1977, the limitations "shall require the application of the best practicable control technology currently available" (BPT). For July 1, 1983, the requirement is "the best available technology economically achievable," (BAT). For new sources, i.e., those whose construction commences after the promulgation of pertinent regulations, the Act provides a "standard of performance" reflecting "the greatest degree of effluent reduction which the Administrator determines to be achievable through application of the best available demonstrated control technology, processes, operating methods, or other alternatives," (BADT).

Primary enforcement of the Act is secured through the permit system established by § 402. Discharge permits

may be issued by the Administrator, § 402(a)(1), or by a state which has adopted a permit program approved by the Administrator. § 402(b). The Administrator has veto power over a state issued permit. § 402(d)(2). The Administrator may withdraw approval of a state permit program if he finds that it is not being administered in accordance with the Act. § 402(c)(3). All permits shall comply with the applicable provisions of §§ 301 (effluent limitations), 306 (new source standards), and other specified sections of the Act. See § 402(a)(1) and (b)(1)(A).

The issuance or denial of a permit may be reviewed by the appropriate court of appeals. § 509(b)(1)(F). A violation of any conditions or limitations imposed by specified sections of the Act or by a permit may result in the imposition of both civil and criminal penalties. § 309. "Citizen Suits" alleging violations of the Act may be brought under § 505.

Section 304(a)(1) provides that within one year after enactment the Administrator [1027] must publish "criteria for water quality accurately reflecting the latest scientific knowledge" on enumerated subjects. Within the same period the Administrator shall publish regulations "providing guidelines for effluent limitations." § 304(b). Subsection (b)(1)(A) applies to the 1977 step and subsection (b)(2)(A) to the 1983 step. Each subsection mandates consideration of factors.

The Administrator did not act within the one year requirements of § 304. Compliance was not within the realm of reality. An estimated 30,000 applications for permits were filed. EPA characterizes the Act as "incredibly complex and demanding." See duPont II infra. A private suit was brought to compel compliance. Natural Resources Defense Council, Inc. v. Train (NRDC), 166 U.S.App.D.C. 312, 510 F.2d 692. The result was a court imposed timetable. Ibid. at 710-714. The regulations here under attack

were promulgated in May and September, 1974, and some were amended in May, 1975.

The EPA regulations relating to industrial discharge of pollutants have produced much litigation. Decisions to date of various courts of appeals are, in chronological order:

- 1—CPC International, Inc. v. Train, 8 Cir., 515 F.2d 1032 (Corn Wet Milling);
- 2—American Iron and Steel Institute v. Environmental Protection Agency, 3 Cir., 526 F.2d 1027 (Iron and Steel Manufacturing);
- 3—American Meat Institute v. Environmental Protection Agency, 7 Cir., 526 F.2d 442 (Meat Products);
- 4—American Petroleum Institute v. Train (API I), 10 Cir., 526 F.2d 1343 (Jurisdiction);
- 5—L. I. duPont de Nemours & Company v. Train (duPont I), 4 Cir., 528 F.2d 1136. Filed December 30, 1975, cert. granted U.S. —, 96 S.Ct. 1662, 48 L.Ed.2d 174 (Jurisdiction);
- 6—E. I. duPont de Nemours & Company v. Train (duPont II), 4 Cir., 541 F.2d 1018. Filed March 10, 1976, cert. granted U.S. —. 96 S.Ct. 3165, 49 L.Ed.2d (Inorganic Chemicals);
- 7-Tanners' Council of America, Inc. v. Train, 4 Cir., 540 F.2d 1188. Filed March 10, 1976 (Leather Tanning);
- 8—FMC Corporation v. Train, 4 Cir., 539 F.2d 973. Filed March 10, 1976 (Plastic and Synthetic Materials);
- 9—Hooker Chemicals & Plastics Corp. v. Train, 2 Cir., 537 F.2d 620. Filed April 28, 1976 (Phosphorous Manufacturing—existing sources);

- 10—Hooker Chemicals & Plastics Corp. v. Train, 2 Cir., 537 F.2d 639. Filed April 28, 1976 (Phosphorous Manufacturing—new sources);
- 11—Natural Resources Defense Council, Inc. v. Environmental Protection Agency, 2 Cir., 537 F. 2d 642. Filed April 28, 1976 (Variance Clauses);
- 12—American Frozen Food Institute v. Train, D.C.Cir., 539 F.2d 107. Filed May 11, 1976 (Frozen Potato Products); and
- 13—Appalachian Power Co. v. Train, 4 Cir., F.2d —. Filed July 16, 1976 (Steam Electric Power)

A cursory glance at the above decisions reveals the difficulties which the federal courts of appeals have had with the Act. Popular demand for legislative action to control water pollution is shown by the fact that on the votes to override the presidential veto, only 12 senators and 23 representatives voted to sustain the veto. Perhaps the pressure on Congress to do something was a major cause of the unsatisfactory legislation. The Act is difficult to understand, construe and apply. We can add nothing to the comments of other courts. See Second Circuit, Hooker Chemicals at 626-627; Third Circuit, Steel Institute, 526 F.2d at 1037 n. 14a; and Fourth Circuit, duPont II, at 1025-1032.

The two volume, 1766 page, legislative history does not help us much. The Second Circuit has said, Hooker Chemicals, at p. 627, that "[t]he legislative history compounds the difficulty." See also statements [1028] of Fourth Circuit, duPont II, at 1027. A comparison of the discussion of the legislative history by the Eighth Circuit in the Corn Wet Milling case, 515 F.2d at 1039-1042 with that found in E. I. du Pont de Nemours and Company v. Train, W.D.Va., 383 F.Supp. 1244, 1254-1255, highlights the problem. We can add nothing to the explication of legislative history

by the Third Circuit in the Steel Institute case, 526 F.2d at 1043-1045, and by the Seventh Circuit in the Meat Institute case, 526 F.2d at 451-452.

In a case involving the Act before us, Train v. Colorado Public Interest Research Group, Inc., the Supreme Court said, — U.S. —, 96 S.Ct. 1938, 48 L.Ed.2d 434, in a quote from United States v. American Trucking Associations, 310 U.S. 534, 543-544, 60 S.Ct. 1059, 84 L.Ed. 1345 that "[w]hen aid to construction of the meaning of words, as used in the statute, is available, there certainly can be no 'rule of law' which forbids its [legislative history's] use, however clear the words may appear on 'superficial examination.'" (Footnotes omitted). The difficulty with the present case is that sometimes the statutory words, phrases, and provisions are clear and sometimes they are not. The same can be said of the legislative history.

We consider both the statute and its legislative history. As said by the Second Circuit, Hooker Chemicals, at p. 627: "The very magnitude of the task undertaken by Congress and delegated to the EPA for fulfillment probably accounts for the lack of clarity." In the discussion which follows, the guiding star is the intent of Congress to improve and preserve the quality of the Nation's waters. All issues must be viewed in the light of that intent.

II.

SCOPE OF REVIEW

The Refineries attack generally all of the pertinent regulations on the grounds of lack of authority and of noncompliance with the Act. They attack certain specific regulations both on the legal ground of noncompliance with the Act and on the factual ground that the record does not sustain the actions of the EPA. We are concerned with informal rule-making by EPA in the exercise of functions delegated to it by the Act. The record consists of notice of proposed action, comments of interested parties, agen-

cy consideration of those comments, and ultimate promulgation of regulations. The regulations, to some extent, must be anticipatory because, although improvements in the techniques of pollutant control can be reasonably expected, we do not know what those improvements will be. The immediate problem is the scope of judicial review.

Much has been written on this subject in the decisions bearing on the Act before us. See e. g., Steel Institute, 526 F.2d at 1047 and Meat Institute, 526 F.2d at 452-453. Essentially they rely on and adopt the principles stated in Citizens to Preserve Overton Park, Inc. v. Volpe, 401 U.S. 402, 416, 91 S.Ct. 814, 28 L.Ed.2d 136. In substance it says that the function of judicial review is to determine (1) authority of the agency, (2) compliance by the agency with the prescribed procedures, and (3) any claim that agency action is arbitrary, capricious, or an abuse of discretion. Ibid. at 415-417, 91 S.Ct. 814.

On legal issues the controlling principles are well defined. Trouble arises in connection with factual issues. Overton Park says that the Administrative Procedure Act, 5 U.S.C. § 706, requires "the reviewing court to engage in a substantial inquiry", and a "probing, in-depth review." Ibid. 401 U.S. at 415, 91 S.Ct. [814] at 823. This is not an adoption of the Universal Camera Corp. v. National Labor Relations Board, 340 U.S. 474, 488, 71 S.Ct. 456, 95 L.Ed. 456, test of substantial evidence in the light of the entire record. It does require consideration and evaluation of the facts. Perhaps agency action which is not based on substantial evidence is arbitrary and capricious.

Many of the regulations are related to EPA policy and the presently unknowable technologies of the future for [1029] pollution control. As was said in *Permain Basin Area Rate Cases*, 390 U.S. 747, 790, 88 S.Ct. 1344, 1372, 20 L.Ed.2d 312, "the breadth and complexity of the Commission's responsibilities demand that it be given every reasonable opportunity to formulate methods of regulation appropri-

ate for the solution of its intensely practical difficulties." Our concern is with a regulatory statute which demands preventive or curative action. Factual certainty of future technologies is impossible. We can do no more than consider whether the record facts supporting EPA action are "adequately adduced and rationally applied." Note, Judicial Review of the Facts in Informal Rulemaking, 84 Yale L.J. 1750, 1764.

The grounds upon which the agency acted must be clearly disclosed in, and sustained by, the record. The agency must make plain its course of inquiry, its analysis, and its reasoning. See duPont II, at p. 1026 and cases there cited. After the fact rationalization by counsel in brief and argument does not cure noncompliance by the agency with the stated principles. Ibid. and Hooker Chemicals, at pp. 633-634. The court may not substitute its judgment for that of the agency. Overton Park, 401 U.S. at 416, 91 S.Ct. 814. If the agency's construction of the controlling statute is "sufficiently reasonable", it should be accepted by the reviewing court. Train v. Natural Resources Defense Council, Inc., 421 U.S. 60, 75, 95 S.Ct. 1470, 43 L.Ed.2d 731.

III.

VALIDITY AND EFFECT OF REGULATIONS

The Refineries say that EPA may not impose effluent limitations on existing sources by regulation. Their position is that effluent limitations on existing sources may be imposed only by the permit issuer. The predicate for the argument is that § 304(b) specifically provides that EPA shall publish "regulations, providing guidelines for effluent limitations says nothing about regulations."

The problem has been considered by several circuits. The Eighth Circuit has held, *CPC*, 515 F.2d at 1037, that EPA may not promulgate regulations establishing effluent limitations for existing sources. All other circuits con-

sidering the problem have held to the contrary. See Second Circuit, Hooker Chemicals, at p. 628; Third Circuit, Steel Institute, 526 F.2d at 1040-1042; Fourth Circuit, duPont II, at pp. 1025-32; Seventh Circuit, Meat Institute, 526 F.2d at 449-452; and D.C. Circuit, Frozen Food Institute, at pp. 124-32.

All of the above cases, except $duPont\ II$, considered the problem in connection with determination of jurisdiction of the court of appeals. Section 509(b), which provides for judicial review of agency action, does not include action taken under § 304. Except for CPC, the courts rejected the argument that § 301 does not authorize the promulgation of effluent limitations by regulation and, hence, § 509(b) does not permit review in the court of appeals. Our situation is the same as that presented in $duPont\ II$. Jurisdiction had been decided and, in the exercise of that jurisdiction, we must determine the authority of EPA to promulgate the regulations.

The Administrator did not meet the one-year requirement for the publishing of regulations "providing guidelines for effluent limitations." § 304(b). The enormity of the task precluded compliance. After the imposition of a court mandated timetable, NRDC, 510 F.2d at 710-714, he published "effluent limitations guidelines", and in so doing said that the action was taken under both § 301 and § 304, along with other sections. API I, 526 F.2d at 1345. Nothing in the Act forbids the combination of § 301 effluent limitations with § 304 guidelines.

At the moment our concern is with authority to promulgate. Section 501(a) authorizes the Administrator "to prescribe such regulations as are necessary to carry out his functions under this Act." His functions are "to administer this Act." § 101(d). The attainment of the congressional intent to protect and preserve water purity comes through control of pollutant discharge. Section 301(e) refers to the establishment of effluent limitations but does [1030]

not say who does the establishing. Section 502(11) defines effluent limitations as "any restriction established by a State or the Administrator." Subsections 402(a)(1) and (b)(1) say that permits shall comply with §§ 301, 306, and other sections not including § 304.

The permit issuer can be either EPA or a conforming state. The division of authority does not determine the authority of EPA to promulgate the regulations. The effect of the regulations presents a separate question. For the reasons stated in *duPont II*, at 1025-32, the promulgation of the limitations was a reasonable exercise of a congressionally delegated power. The action is reasonable and we accept it.

IV.

EFFLUENT LIMITATIONS

The basic dispute between the Refineries and EPA is whether the regulations are § 301 effluent limitations or § 304 guidelines. EPA contends that the regulations are uniformly applicable throughout the nation and, with some exceptions, must be mechanically cranked into each permit by the issuer. The Refineries insist that the regulations are guidelines for the information and consideration of, but not binding on, the permit issuer. In essence, the conflict concerns national uniformity versus state power and responsibility.

The Act is ambivalent. Section 101(a) refers to the "integrity of the Nation's waters," "the national goal," and "the national policy." Section 101(b) declares the policy of Congress "to recognize, preserve, and protect the primary responsibilities and rights of States to prevent, reduce, and eliminate pollution." The legislative history confuses, rather than clarifies, the issue.

In Palmer v. Massachusetts, 308 U.S. 79, 84, 60 S.Ct. 34, 36, 84 L.Ed. 93, the Court said that: the "absorption of

state authority is a delicate exercise of legislative policy in achieving a wise accommodation between the needs of central control and the lively maintenance of local institutions." (Footnote omitted). The definition of the roles of each government is essentially a matter for Congress, not for the courts.

The Act is ineffective unless somebody fixes effluent limitations. The Administrator has done so and we have upheld his authority. If the limitations must be applied automatically to each permit application, the Act destroys rather than preserves the rights of the states which § 101(b) says that Congress protects. If each state may go its own way, the national policy declared by § 101(a) is inhibited. Some accommodation is necessary.

We can do no more than the Fourth Circuit did in du-Pont II. It said that the EPA limitations are presumptively applicable and controlling unless rebutted by a permit applicant. At 1028. The burden is thus placed on an applicant to convince the permit issuer that the general limitations do not apply to his particular situation. As said by the Fourth Circuit, Ibid. at 1028, "The balance of general rule and narrow exceptions assures all possible uniformity without sacrifice of the flexibility needed to adjust for disparate plants in dissimilar circumstances."

The Refineries insist that the permit issuer must consider the factors stated in § 304(b)(1)(B) for the 1977 step and in (b)(2)(B) for the 1983 step and exercise his discretion in applying them. We are concerned with rule-making, not with adjudication. Our holding is that the Administrator had authority to promulgate the limitations for existing sources and that the effect of the regulations so promulgated is not contrary to the Act. In particular instances, modification or variation may be necessary. If that problem arises, the issues may be determined by judicial review on the basis of actual facts under § 509(b) (1)(F).

V.

SINGLE NUMBERS

The regulations impose effluent limitations in terms of single numbers rather than in a range of numbers. The Refineries point out that § 304(b) requires EPA to publish "regulations, providing guidelines for effluent limitations." The use of [1031] "guidelines" is said to intend a range, not a fixed number.

The Refineries emphasize the use of the word "amounts" in the § 304(b)(1)(A) provision that the regulations shall "identify, in terms of amounts of constituents and chemical, physical, and biological characteristics of pollutants, the degree of effluent reduction attainable * * *." "Amounts" refers to pollutants. When "amounts" are determined, EPA then fixes the "degree" of effluent reduction attainable. "Degree" may be either a "range" or a single number.

The imprecise wording of § 304(b)(1)(A) and (B) makes difficult the ascertainment of congressional intent. Congress does not use the word "range" or any equivalent. The Senate Committee Report, Leg.Hist. 1468, says that Congress "expects" EPA "to define a range of discharge levels," and again, Ibid. that EPA "should establish the range of best practicable levels." In the face of the statutory language, the statements in the Senate Report are mystifying.

Three circuits have considered the problem. In the Steel Institute case, 526 F.2d 1027, the Third Circuit treated the effluent limitations as establishing a ceiling, fixing the maximum permissible amount of pollutant discharge. Ibid. at 1044-1045. EPA determines the base by consideration of "the numerous differences in processes and capabilities of point sources." (Footnote omitted). Ibid. at 1045. The base is the minimum degree of effluent control permissible and the ceiling is the maximum discharge permissible. Ibid. Thus the § 304 "guidelines are

intended to provide precise guidance to the permit-issuing authorities in establishing a permissible level of discharge that is more stringent than the ceiling." Ibid. Taken literally, the Third Circuit opinion may mean that in issuing a permit a state may not exercise the option inherent in § 510 of adopting a limitation more stringent than the base which EPA has fixed.

The Second Circuit rejected the argument that the regulations are invalid because EPA failed to establish permissible ranges of discharges and instead promulgated single number maximum discharge levels. The court said, at p. 630:

"[W]e * * believe that whenever Congress spoke of 'ranges' in the debates over the Act, it meant only the spectrum comprised of varying discharge levels on a subcategorical, rather than individual, basis. (citation omitted) Although variances are conceivable at the permit-granting stage (citation omitted) Congress intended that the regulations establish a single discharge level for a given subcategory. This is implicit in the Congressional choice of the superlative form in the statutory language requiring achievement of the degree of effluent reduction attainable by application of 'best' technology."

In duPont II, the Fourth Circuit disagreed with the Third. In so doing, it pointed out, at p. 1029, that nothing in the Act prohibits EPA from using single numbers in establishing effluent limitations. The use of a single number permits any discharge from zero up to the allowed amount. If a range is required, a zero discharge provision violates the Act which has as its objective the elimination of all pollutant discharges by 1985. Section 101(a)(1). The court said "The expertise of the Administrator is persuasive as to whether the limitations be fixed in single numbers or ranges." Ibid. at 1028. It upheld the use of

single numbers in the inorganic chemicals subcategories which were before it.

We agree with the Second and Fourth Circuits. The promulgation of the regulations was a form of rule-making. Rules are necessarily general. The parties confront us with hypothetical situations. We do not know how the rules will work out in practice. We reject the EPA claim that the regulations must be mechanically cranked into every permit which may be issued. We also reject the claim of the Refineries that the permit issuer has unbridled discretion in the application of the regulations to any permit application. The correct answer lies somewhere between these extremes. The intent of Congress was to clean up the Nation's waters. This cannot be done overnight. On the [1032] road to attainment of the no discharge objective some flexibility is needed. The extent of that flexibility may be determined by Congress through precise amendments to the Act or by the courts in the decision of cases presenting facts rather than hypotheses. For the purpose of generalrulemaking, we accept the use of single numbers in the effluent limitations under consideration.

VI.

VARIANCE

The Refineries attack the 1977 step variance provisions found at 40 C.F.R. §§ 419.12, 419.22, 419.32, 419.42, and 419.52. These provisions are substantially identical to similar provisions found in each of the categories and subcategories covered by EPA regulations under the Act. For the 1983 step the statute provides for variances. See § 301 (c). It does not do so for the 1977 step.

Section 419.12 is typical of the 1977 variance provisions with which we are concerned. It says in its first sentence that EPA in establishing limitations took into consideration specified factors, including "age and size of plant,

raw materials, * * * treatment technology available, energy requirements and costs." The second sentence recognizes the possibility that "data which would affect these limitations have not been available" and that as a result, the limitations should be adjusted for certain plants in the industry. The third sentence says that a discharger may submit evidence:

"[t]hat factors relating to the equipment or facilities involved, the process applied, or other such factors related to such discharger are fundamentally different from the factors considered in the establishment of the guidelines."

The fourth sentence says that the permit issuer "will make a written finding that such factors are or are not fundamentally different."

Again we have an area of uncertainty. There is not only a conflict between circuits but also a conflict within one circuit. In NRDC v. EPA, the Second Circuit held, at p. 647, that the promulgation of the variance clauses for the 1977 step is "a valid exercise of the EPA's rule-making authority pursuant to §501(a)." The court also said, Ibid. that the interpretation of the variance clauses "should await the disclosure and development of concrete factual controversies involving a single point source and its permit."

In the Steel Institute case the Third Circuit said, 526 F.2d at 1046:

"We also note that the variance procedure provides for less flexibility than we believe Congress contemplated, since it permits deviations from otherwise rigid and unitary limitations only where the circumstances of the particular plant are 'fundamentally different' than those from which the effluent limitation was derived." The Third Circuit perhaps overlooked the fact that Congress did not provide any variance procedure for the 1977 step.

In duPont II the Fourth Circuit declined to determine the validity of the variance provisions, saying that the administration of those provisions is presently speculative and will arise when a claim for a variance is made in a permit application.

In Appalachian Power Company v. Train, the Fourth Circuit, with one judge dissenting, set aside the 1977 variance provisions applicable to a subcategory of the Steam Electric Power Generating Point Source Category, 40 C.F.R. § 423.12(a). It interpreted the clause to mean that "only technical and engineering factors, exclusive of cost, may be considered in granting or denying a variance." At — (footnote omitted). In so doing the court relied on a memorandum from the EPA Assistant Administrator for Enforcement and General Counsel to all regional administrators. The court said that this administrative interpretation distinguished the Appalachian Power case from duPont II.

The court further held that the 1977 limitations "were not intended to be applied [1033] any less flexibily" than the 1983 limitations. Ibid. p. 1028. In so acting the court did not have before it any specific claim, grant, or denial of a variance. It was concerned with a general rule which was considered on a hypothetical basis and had no regard for an existing and specific fact situation.

The Refineries do not make clear their reasons for attacking the regulatory variance regulations for the 1977 step. The statute says nothing about variances for that step. We agree with the Second Circuit that the 1977 variance provisions are a valid exercise of EPA's rule-making authority under § 501(a). We also agree with duPont II that variances are appropriate to the regulatory process

at p. 1028, and that the 1977 BPT technology may not be construed more stringently than the 1983 BAT technology. We reject the Fourth Circuit holding that the 1977 variance provisions are "unduly restrictive" and hence void. Appalachian Power, at p.—. Such a holding forgets that Congress did not provide for any 1977 variance.

Without record support, the Refineries assert that no variance has been granted. Even if true, the statement proves nothing. Any permit applicant dissatisfied with action on a variance claim may petition for review under § 509(b)(1)(F). From the standpoint of general rule-making, the regulatory variance provisions for the 1977 phase are reasonable. Their interpretation and application must await action on a variance claim asserting specific facts. We will not speculate what the result may be.

VII.

1977 STEP

(1) In-Plant Process Changes.

Important to determination of effluent limitations are flow rates and concentration of discharge components. In arriving at its regulations EPA considered in-plant flow modifications. Refineries argue that the BPT (1977 step) technologies can only apply to end-of-pipe treatment systems and that EPA cannot consider and require in-plant process changes.

The Act uses different language in its provisions for the 1977 and 1983 steps. In § 304(b)(1)(A) the reference is to "control technology" whereas in § 304(b)(2)(A) the reference is to "control measures and practices" including process innovations. Both sections specify "the process employed" as one of the factors to be taken into consideration. §§ 304(b(1)(B)) and (b)(2)(B).

Two circuits have wrestled with the problem. In duPont II, at pp. 1030-31 the Fourth Circuit noted the statutory language and rejected the argument that for the 1977 step EPA was confined to end-of-pipe treatment systems. In FMC, at p. 981, the Fourth Circuit said that EPA was to rely "principally" on end-of-pipe technology and that "Inprocess control measures may be required, however, if they are considered normal practice within the industry." Ibid. (footnote omitted). In Hooker Chemicals, the Second Circuit held, June 14, 1976, memo modifying original opinion, that "no in process' changes can be mandated for 1977 unless they may be considered normal practices within the industry." At p. 637.

Refineries make much of the statement in the House Report, Leg.Hist. 788, that "control technology * * * means the treatment facilities at the end of a manufacturing * * * process rather than * * * within the manufacturing process itself." We decline to accept this statement of one chamber of Congress. If both chambers had agreed, the language of the statute would have been changed. Indeed, the Refineries concede, see reply brief, p. 28 n. 28, and R. 7326, that pre-treatment processes may be required if they are normal practice within the industry.

EPA's designation of in-plant technology for the 1977 step was based on "control practices widely used within the petroleum refining industry." Dev.Doc. 165 and R. 6065. This conclusion is supported by record evidence. Ibid. at 70, 95 and R. 5970, 5995. We find no record support for the claim that more than half of the Nation's refineries will have to make substantial and widespread internal reconstruction to comply with the regulations. EPA has relied [1034] principally on end-of-pipe technology in its regulations for the 1977 step. Whatever in-plant modifications may be necessary are reasonably within normal industry practice. EPA action is within the statutory requirements.

(2) Exemplary Plants.

The statutory mandate for 1977 is "best practicable control technology currently available." § 301(b)(1)(A). Refineries say that EPA must look to the average of the industry and EPA says that it may look to the average of the best technology used in the industry.

With varying language the circuits agree that EPA may base its regulations on the results from the plants using the best technology. See *Hooker Chemicals*, at p. 632; *Steel Institute*, 526 F.2d at 1057, *duPont II*, at p. 1031; *Meat Institute*, 526 F.2d at 453; and *Frozen Food Institute*, at p. 132. We agree. There is no reason for us to enlarge what has been said in the cited decisions. It is conceded that at least 12 of the refineries are already in compliance with the 1977 regulations. See petitioners Tech. Brief 37, n. 23, and Reply Brief 24, n. 22. The EPA action was proper.

(3) Granular Media Filtration.

Refineries contest the 1977 limitations for Total Suspended Solids (TSS) and Oil and Grease (O&G) on the basis that EPA has required granular media filtration and that such technology is neither practicable nor currently available.

Granular Media Filtration is only one of the control practices widely and currently used within the petroleum refining industry. Dev.Doc. 165 and 6065. The regulations do not require the use of granular media filtration. Any one of a number of technologies or combination of technologies may be used. Ibid.

Refineries do not contest that many plants are already meeting the O&G limitations. EPA based its TSS limitations on three exemplary plants. These met the TSS limitations during 90%, 80%, and 70% of the monthly samples during 1973 and 1974. During its reconsideration of the

regulations, EPA concluded that any failures to meet the limitations were due to improperly operated filters or use of filters beyond design capacity.

Refineries objections to EPA's use of data obtained after promulgation is not well taken. The new data was not the basis for the regulations. It serves to establish that the EPA technologies are both practicable and currently available. After promulgation, events indicating the truth or falsity of agency predictions should not be ignored. Amoco Oil Co. v. Environmental Protection Agency, 163 U.S.App. D.C. 162, 501 F.2d 722, 729 n. 10. This is not a case like duPont II where new, non-record evidence was rejected as the sole basis for agency action, at pp. 1036-39. In the instant case the record made before promulgation sustains the regulations. The new data is pertinent to show the validity of the EPA actions. The 1977 TSS and O&G limitations are upheld.

(4) Net or Gross Limitations.

Net limitations apply only to the excess of pollutants discharged over the pollutants, if any, in the intake water. Gross limitations apply to the total amount of pollutants discharged regardless of pollutants in the intake water. Refineries say that the limitations must be met.

In Steel Institute, the Third Circuit recognized the problem and said that "an adjustment would seem required by due process" because otherwise a plant would be penalized "because of circumstances beyond its control." 526 F.2d at 1056. EPA has agreed that net limitations are allowable where a source discharges to the same body of water from which it draws its water. In 1975 EPA added a new regulation, § 125.28, to its general regulations applicable to the administration of the Act. 40 Fed.Reg. 29850. This new regulation allows adjustment of the limitations "to reflect credit for pollutants in the applicant's water supply if the source of the applicant's water supply is the same body of water into which the [1035] discharge is made", if certain requirements are met. § 125.28(a).

EPA concedes that its concentrations are based on gross limitations. The Refineries say that the concession requires a remand. We do not agree. Section 125.28(a)(2) allows a permit applicant to demonstrate that pollutants in the intake water will not be removed by treatment systems designed to reduce process wastewater pollutants to the levels required by the applicable limitations. In an appropriate situation, gross will be reduced to net and a plant will not be penalized for something which it cannot prevent. See discussion in Appaachian Power, pp. ————. From the standpoint of general rule-making the amendment is satisfactory. Its application may be determined in a controversy arising out of specific facts.

(5) Storm Water Runoff.

During periods of rainfall, a refinery must treat not only wastewater flow from the refinery but also storm water runoff. The pertinent regulations, $40 \text{ C.F.R.} \leqslant 419.12(c)(1)$ and 419.15(c)(1) provide:

"The allocation allowed for storm runoff flow shall be based solely on that storm flow (process area runoff) which is treated in the main treatment system. All additional storm runoff (from tank fields and non-process areas), that has been segregated from the main waste stream for discharge, shall not exceed stated limitations]."

These regulations are made applicable to all subparts in Part 419.

EPA furnishes no record reference to support this regulation. It relies on after-the-fact rationalization in its brief but such rationalization is no substitute for agency action not sustained by the record. duPont II, at pp. 1036,

1037, 1038. EPA says that "'process area runoff'" is intended to encompass all "process waste water' pollutants as defined in 40 C.F.R. § 401.11(q)." EPA Br. at 110. That regulation has general applicability to Subchapter N which includes the regulations for the Petroleum Refining Industry. In duPont II, at pp. 1032-33, the Fourth Circuit noted that EPA was preparing an amendment to § 401.11(q) and set that regulation aside. We are not told what, if anything, EPA has done to rewrite the regulation.

The statement in the EPA brief of how the storm runoff regulation is intended to work is interesting but unsatisfactory. We have no definition of the term "storm runoff." The EPA brief says, p. 111, that "all storm runoff is to be collected and monitored." Taken literally this means that the refineries will have to collect diffused surface runoff in channels and discharge it through a discrete source. There is no statutory or record support for such requirement.

Sections 419.12(c)(1), 419.15(c)(1), and subsequent sections based thereon are set aside and remanded for reconsideration.

(6) Variability Factors.

Even in the best treatment systems, changes occur in ability to treat wastes. Sixteen factors which cause variability are listed in 40 Fed.Reg. 21941. EPA defines, B.R. at 113, the daily variability factor "as the 99th percentile probability of occurrence value divided by the mean." The result is "the multiplier by which the long-term achievable values must be multiplied in order to derive the value not permitted to be exceeded." Ibid. For the 30 day variability factor the 98th percentile is used. The application of the formula is shown at § 419.42(b)(3).

The briefs on variability disclose much rhetoric and a turmoil of numbers. We disregard the first and struggle with the second. Refineries claim that the use of the 99 and 98 percentiles is improper. They attack EPA's statistical methodology. They say that EPA used "an insufficient and geographically biased data base", API Tech. Br. at 94, and disregarded "differences among refinery subcategories." Ibid. at 99.

Statistical methodology is for the experts. The EPA statement of its procedures and of the bases therefor found at 40 Fed.Reg. [1036] 21941-21942 convinces us that the EPA variability factors have susbtantial record support. In promulgating the final regulations EPA analyzed data from 10 refineries with a geographical distribution which included Virginia, Texas and California. On petition for reconsideration EPA rechecked the variability data from seven refineries some of which are located in cold climates, e.g., the Amoco refinery in Mandan, North Dakota. With regard to the differences among the five subcategories, the refineries furnish us with no record data showing that variability changes from one subcategory to another.

Refineries urge that "excursions" should be permitted. An "excursion" is a period when the required concentrations may be exceeded. Because EPA selected the 99th percentile, the refineries say that they must be afforded at least four days a year, 1% of 365, when they may make excess discharges without fear of penalty. The reasoning does not impress us. There is always a theoretical chance that a plant achieving the limitations on a long-term basis will exceed the monthly and daily limits. In FMC, the Fourth Circuit said that: "Plant owners should not be subjected to sanctions when they are operating a proper treatment facility." 539 at p. 986. The court went on to say that "appropriate excursion provisions" should be incorporated in the regulations. Ibid.

The Fourth Circuit was considering a factual situation different from that before us. On the present record we are unconvinced that the refineries should be granted any specific number of days during a year when they may make excess discharges. The temptation to store pollutants for future discharge would be enticing. The permissible maximums for any one day are about twice the average daily values for a month. See tables found in § 419.12(a) and (b). The spread permits considerable flexibility.

The whole problem of variability factors presents a practical effort to accommodate for variations in plant operations. As technology for control of pollutant discharges improves, the variations should lessen. The choice of statistical methods lies within the sound discretion of EPA. EPA has acted properly and reasonably in establishing the variability factors before us.

(7) Petrochemical Plants.

EPA divided the petroleum refining industry into five subcategories. Two of these, Subparts C and E, relate to refineries which engage in petrochemical operations. Refineries argue that the stringent regulations imposed on Subparts C and E place the plants subject thereto at a competitive disadvantage with the organic chemicals industry and with refineries which do not conduct petrochemical operations. The challenge based on the organic chemical industry has a hollow ring. The Fourth Circuit has set aside the effluent limitations applicable to the organic chemical industry. See *Union Carbide Corp.* v. *Train*, 4 Cir., Nos. 74-1459 etc., order of February 10, 1976. We do not know what will be the regulations applicable to that industry.

Refineries' reliance on Industrial Union Department, AFL-CIO v. Hodgson, 162 U.S.App.D.C. 331, 499 F.2d 467, and Portland Cement Association v. Ruckelshaus, 158 U.S. App.D.C. 308, 486 F.2d 375, cert. denied, 417 U.S. 921, 94 S.Ct. 2628, 41 L.Ed.2d 226, is misplaced. Industrial Union was involved with the Occupational Safety and Health Act. With reference to industrial standards the court said, 499 F.2d at 480:

"Separate standards for different industries would not appear to create opportunities for employers in one industry to challenge their standards on the grounds that standards for another industry were less demanding."

Portland Cement was concerned with the Clean Air Act. The court said, 486 F.2d at 389, that "the Administrator is not required to present affirmative justifications for different standards in different industries."

We find nothing in the Act or its legislative history which requires EPA to consider the competitive effect of its regulations. EPA did consider the comments relative to [1037] petrochemical operations, 40 Fed.Reg. 21948-21949, and said:

"Since the regulations are based upon actual performance by refineries in each subcategory, it would be absurd to attempt to modify them on the basis of regulations designed for other industries."

In this attack on the regulations pertaining to petrochemical operations, the refineries do not contest the methodology, the data base, or the achieveability of the limitations for the two subcategories in question. EPA has used the same general approach in setting the limitations for all the categories in the petroleum industry. The record sustains the pertinent EPA action. The regulations applicable to petrochemical operations, 40 C.F.R. §§ 419.32 and 419.52 are upheld.

(8) Costs.

Section 304(b)(1)(B) requires that the EPA regulations for the 1977 step shall specify BPT factors including "consideration of the total cost of application of technology in relation to the effluent reduction benefits to be achieved

from such application." Refineries say that EPA did not comply with this statutory requirement.

The Refineries' costs of compliance with the 1977 regulations will be substantial and will be reflected in increased passed-on-costs to the consuming public. The need for, and attainment of, societal benefits are essentially issues for congressional determination. Congress has delegated to EPA the task of giving "consideration" to "total cost" in relation to "effluent reduction benefits." The judicial responsibility is to determine whether EPA has complied with the mandate.

The Senate committee recognized that "there must be a reasonable relationship between costs and benefits if there is to be an effective and workable program." Leg. Hist. 1465. The same Committee said that "no mathematical balance can be achieved in considering relative costs and benefits nor would any precise formula be desirable." Ibid. at 1466.

In duPont II the Fourth Circuit rejected the argument that benefits "must be quantified in monetary terms", and said: "Nothing in the Act requires this action." At p. 1030. We agree. The judicial problem is whether EPA adequately considered costs and benefits.

EPA estimated the capital investment costs to be 1,112 million dollars for existing sources. The Refineries estimate, which includes "Expansions of Existing Refineries" is 1,558 million dollars. The annual costs for existing refineries are estimated to be 449 million dollars. The Refineries' estimate, which also includes expansion costs, is 544 million dollars. In the area of capital costs, the Refineries put the expansion costs at 490 million dollars. Subtraction of this amount from the Refineries' total of 1,558 million produces 1,068 million, a figure slightly below that of EPA.

Refineries object that EPA used stale cost figures. Cost increases are inherent during a period of inflation. EPA

points out that the important consideration is not the levet of abatement costs but rather the resulting impact on the industry. EPA's "Economic Analysis of Proposed Effluent Guidelines, Petroleum Refining Industry," R. 5788-5889, considers the problem both from the standpoint of world markets and of United States markets. In doing so EPA discusses prices, profitability, production effects, employment effects, industry growth, and balance of trade. Although the dollar amount of the abatement costs may be high, one commentator stated that the capital requirements of the regulations amount to 3.3% of the total capital requirements of the industry. R. 5545.

Refineries urge that EPA must make a cost-benefit analysis. EPA says that its cost-effectiveness analysis satisfies the statute. Labels are neither important nor determinative. EPA said that costs depend "essentially" on waste water flow rate and prepared a table comparing costs with flow rates. EPA computed costs for several combinations of refinery size, waste water discharge rate, and extrapolated costs of in-plant modifications to reduce [1038] waste water flow. The selection of the point of diminishing returns is for agency determination. The technical objections of the Refineries do not impress us.

The record shows that the effluent limitations imposed by the regulations will reduce the pollutants discharged into the Nation's waters. The value of the resulting benefits is not capable of present-day determination. We are convinced that EPA made a serious, careful, and comprehensive study of the costs which compliance will impose on the industry. If Congress believes that the cost is too high, it can amend the Act. All we say is that EPA has complied with the statutory mandate.

VIII.

1983 STEP

For the 1983 BAT technology EPA proposed an endof-pipe treatment system "based on the addition of activated carbon adsorption in fixed bed columns, to the treatment system" proposed as 1977 BPT technology. Dev.Doc. 174, R. 6074. In so doing EPA noted that its limitations were "based upon pilot plant data" and that revision may be required "as actual performance data becomes available." Ibid. The Refineries contend that the carbon adsorption technology is not available or economically achievable. We agree.

EPA concedes in its brief, p. 138, that:

"As for carbon adsorption, the Agency readily acknowledges that it needs further development before it will show the high degree of effectiveness in large-scale operation that it has already shown in pilot plant demonstrations."

In its response to comments that carbon adsorption had had not been demonstrated as a proper base for 1983 limitations, EPA relied on named technical articles and on "The BP, Marcus Hook, 1974, pilot plant study of Filtration and Activated Carbon." 40 Fed. Reg. 21948-21949, R. 17614. EPA concedes, brief p. 143, that "the BP Marcus Hook system does not meet the BAT limitations."

EPA now says that the BP data was relied on only for O&G and that these limitations have been shown achievable by later data from a non-record refinery not using carbon adsorption. Also EPA now claims that the TSS limitations are based on "municipal wastewater experience." Brief at 143. The record reference cited in the brief is an unidentified, illegible, handwritten sheet which means nothing to us.

Examination of EPA's record citations and appraisal of its shifting and inconsistent rationales make it difficult for us to discern upon what, if any, basis EPA promulgated the 1983 limitations. The failure of the BP plant to achieve the limitations when placed in full-scale operation may not be ignored. We can ascertain no reasonable basis for the 1983 limitations. See FMC, at pp. 981, n. 16; cf. Tanners' Council, at p. 1196. We reject the 1983 regulations because of their reliance on the carbon adsorption technology. In the circumstances there is no need to consider the other attacks of the Refineries on those regulations. The questions raised, particularly those relating to costs, should be considered by EPA on remand.

The 1983 regulations, 40 C.F.R. §§ 419.13, 419.23, 419.33, 419.43, and 419.53, are set aside.

IX.

NEW SOURCES

EPA established standards fixing the BADT technology for new sources by adding the 1983 flow limitations to the control technology applicable to the 1977 BPT step. The attack of the Refineries has three bases, (1) invalidity of the 1977 limitations, (2) unattainability of the 1983 limitations by existing sources, and (3) the use of stale cost figures.

We have upheld the 1977 limitations as supported by the record. Hence, the fact that the new source limitations are derivative is no ground for attack. Cf. Tanners' Council, at 1195. Because of our disposition of the 1983 limitations, we did not reach the issue of whether the flow reductions are attainable. Even if the 1983 flow reductions are unattainable by existing refineries, it does not follow that new plants could not be designed so as to incorporate [1039] the means of attaining the lower flow rates. There is no record support for the claim that the flow rates for new

sources are unattainable. The matter of costs has been discussed in connection with the 1977 step, see Part VII(8) of this opinion, and need not be considered further. The regulations pertaining to new source standards, 40 C.F.R. §§ 419.15, 419.25, 419.35, 419.45, and 419.55 are upheld.

X.

DISPOSITION

The following regulations, all contained in 40 C.F.R., are severally set aside and remanded for reconsideration: Storm water runoff ($\S\S419.12(c)(1)$ and 419.15(c)(1)) and with regard to storm water runoff only: $\S\S419.22(c)(1)$, 419.25(c)(1), 419.32(c)(1), 419.35(c)(1), 419.42(c)(1), 419.45(c)(1), 419.52(c)(1), and 419.55(c)(1) and 1983 step ($\S\S419.13$, 419.23, 419.33, 419.43, and 419.53).

APPENDIX B

STATUTES INVOLVED

The pertinent provisions of the Federal Water Pollution Control Act, as amended, 33 U.S.C. §§ 1251 et seq., are as follows:

§ 1251. Congressional declaration of goals and policy [Act § 101]

- (a) The objective of this chapter is to restore and maintain the chemical, physical, and biological integrity of the Nation's waters. In order to achieve this objective it is hereby declared that, consistent with the provisions of this chapter—
 - (1) it is the national goal that the discharge of pollutants into the navigable waters be eliminated by 1985;
 - (2) it is the national goal that wherever attainable, an interim goal of water quality which provides for the protection and propagation of fish, shellfish, and wildlife and provides for recreation in and on the water be achieved by July 1, 1983;
 - (3) it is the national policy that the discharge of toxic pollutants in toxic amounts be prohibited:
 - (4) it is the national policy that Federal financial assistance be provided to construct publicly owned waste treatment works;
 - (5) it is the national policy that areawide waste treatment management planning processes be developed and implemented to assure adequate control of sources of pollutants in each State; and
 - (6) it is the national policy that a major research and demonstration effort be made to develop technology necessary to eliminate the discharge of pollutants into the navigable waters, waters of the contiguous zone, and the oceans.

- (b) It is the policy of the Congress to recognize, preserve, and protect the primary responsibilities and rights of States to prevent, reduce, and eliminate pollution, to plan the development and use (including restoration, preservation, and enhancement) of land and water resources, and to consult with the Administrator in the exercise of his authority under this chapter. It is further the policy of the Congress to support and aid research relating to the prevention, reduction, and elimination of pollution, and to provide Federal technical services and financial aid to State and interstate agencies and municipalities in connection with the prevention, reduction, and elimination of pollution.
- (c) It is further the policy of Congress that the President, acting through the Secretary of State and such national and international organizations as he determines appropriate, shall take such action as may be necessary to insure that to the fullest extent possible all foreign countries shall take meaningful action for the prevention, reduction, and elimination of pollution in their waters and in international waters and for the achievement of goals regarding the elimination of discharge of pollutants and the improvement of water quality to at least the same extent as the United States does under its laws.
- (d) Except as otherwise expressly provided in this chapter, the Administrator of the Environmental Protection Agency (hereinafter in this chapter called "Administrator") shall administer this chapter.
- (e) Public participation in the development, revision, and enforcement of any regulation, standard, effluent limitation, plan, or program established by the Administrator or any State under this chapter shall be provided for, encouraged, and assisted by the Administrator and the States. The Administrator, in cooperation with the States, shall develop and publish regulations specifying minimum guidelines for public participation in such processes.

(f) It is the national policy that to the maximum extent possible the procedures utilized for implementing this chapter shall encourage the drastic minimization of paperwork and interagency decision procedures, and the best use of available manpower and funds, so as to prevent needless duplication and unnecessary delays at all levels of government.

§ 1311. Effluent limitations—Illegality of pollutant discharges except in compliance with law [Act § 301]

(a) Except as in compliance with this section and sections 1312, 1316, 1317, and 1328, 1342, and 1344 of this title, the discharge of any pollutant by any person shall be unlawful.

Timetable for achievement of objectives

- (b) In order to carry out the objective of this chapter there shall be achieved—
 - (1)(A) not later than July 1, 1977, effluent limitations for point sources, other than publicly owned treatment works, (i) which shall require the application of the best practicable control technology currently available as defined by the Administrator pursuant to section 1314(b) of this title, or (ii) in the case of a discharge into a publicly owned treatment works which meets the requirements of subparagraph (B) of this paragraph, which shall require compliance with any applicable pretreatment requirements and any requirements under section 1317 of this title; and
 - (B) for publicly owned treatment works in existence on July 1, 1977, or approved pursuant to section 1283 of this title prior to June 30, 1974 (for which construction must be completed within four years of approval), effluent limitations based upon secondary treatment as defined by the Administrator pursuant to section 1314(d)(1) of this title; or,

- (C) not later than July 1, 1977, any more stringent limitation, including those necessary to meet water quality standards, treatment standards, or schedules of compliance, established pursuant to any State law or regulations (under authority preserved by section 1370 of this title) or any other Federal law or regulation, or required to implement any applicable water quality standard established pursuant to this chapter.
- (2)(A) not later than July 1, 1983, effluent limitations for categories and classes of point sources, other than publicly owned treatment works, which (i) shall require application of the best available technology economically achievable for such category or class, which will result in reasonable further progress toward the national goal of eliminating the discharge of all pollutants, as determined in accordance with regulations issued by the Administrator pursuant to section 1314(b)(2) of this title, which such effluent limitations shall require the elimination of discharges of all pollutants if the Administrator finds, on the basis of information available to him (including information developed pursuant to section 1325 of this title), that such elimination is technologically and economically achievable for a category or class of point sources as determined in accordance with regulations issued by the Administrator pursuant to section 1314(b)(2) of this title, or (ii) in the case of the introduction of a pollutant into a publicly owned treatment works which meets the requirements of subparagraph (B) of this paragraph, shall require compliance with any applicable pretreatment requirements and any other requirement under section 1317 of this title; and
- (B) not later than July 1, 1983, compliance by all publicly owned treatment works with the requirements set forth in section 1281(g)(2)(A) of this title.

Modification of timetable

(c) The Administrator may modify the requirements of subsection (b)(2)(A) of this section with respect to any point source for which a permit application is filed after July 1, 1977, upon a showing by the owner or operator of such point source satisfactory to the Administrator that such modified requirements (1) will represent the maximum use of technology within the economic capability of the owner or operator; and (2) will result in reasonable further progress toward the elimination of the discharge of pollutants.

Review and revision of effluent limitations

(d) Any effluent limitation required by paragraph (2) of subsection (b) of this section shall be reviewed at least every five years and, if appropriate, revised pursuant to the procedure established under such paragraph.

All point discharge source application of effluent limitations

(e) Effluent limitations established pursuant to this section or section 1312 of this title shall be applied to all point sources of discharge of pollutants in accordance with the provisions of this chapter.

Illegality of discharge of radiological, chemical, or biological warfare agents or high-level radioactive waste

(f) Notwithstanding any other provisions of this chapter it shall be unlawful to discharge any radiological, chemical, or biological warfare agent or high-level radioactive waste into the navigable waters.

§ 1314. Information and guidelines—Criteria development and publication [Act § 304]

(a)(1) The Administrator, after consultation with appropriate Federal and State agencies and other interested

persons, shall develop and publish, within one year after October 18, 1972 (and from time to time thereafter revise) criteria for water quality accurately reflecting the latest scientific knowledge (A) on the kind and extent of all identifiable effects on health and welfare including, but not limited to, plankton, fish, shellfish, wildlife, plant life, shorelines, beaches, esthetics, and recreation which may be expected from the presence of pollutants in any body of water, including ground water; (B) on the concentration and dispersal of pollutants, or their byproducts, through biological, physical, and chemical processes; and (C) on the effects of pollutants on biological community diversity. productivity, and stability, including information on the factors affecting rates of eutrophication and rates of organic and inorganic sedimentation for varying types of receiving waters.

- (2) The Administrator, after consultation with appropriate Federal and State agencies and other interested persons, shall develop and publish, within one year after October 18, 1972 (and from time to time thereafter revise) information (A) on the factors necessary to restore and maintain the chemical, physical, and biological integrity of all navigable waters, ground waters, waters of the contiguous zone, and the oceans; (B) on the factors necessary for the protection and propagation of shellfish, fish, and wildlife for classes and categories of receiving waters and to allow recreational activities in and on the water; and (C) on the measurement and classification of water quality; and (D) for the purpose of section 1313 of this title, on and the identification of pollutants suitable for maximum daily load measurement correlated with the achievement of water quality objectives.
- (3) Such criteria and information and revisions thereof shall be issued to the States and shall be published in the Federal Register and otherwise made available to the public.

Effluent limitation guidelines

- (b) For the purpose of adopting or revising effluent limitations under this chapter the Administrator shall, after consultation with appropriate Federal and State agencies and other interested persons, published within one year of October 18, 1972, regulations, providing guidelines for effluent limitations and, at least annually thereafter, revise if appropriate, such regulations. Such regulations shall—
 - (1) (A) identify, in terms of amounts of constituents and chemical, physical, and biological characteristics of pollutants, the degree of effluent reduction attainable through the application of the best practicable control technology currently available for classes and categories of point sources (other than publicly owned treatment works); and
 - (B) specify factors to be taken into account in determining the control measures and practices to be applicable to point sources (other than publicly owned treatment works) within such categories or classes. Factors relating to the assessment of best practicable control technology currently available to comply with subsection (b) (1) of section 1311 of this title shall include consideration of the total cost of application of technology in relation to the effluent reduction benefits to be achieved from such application, and shall also take into account the age of equipment and facilities involved, the process employed, the engineering aspects of the application of various types of control techniques, process changes, non-water quality environmental impact (including energy requirements), and such other factors as the Administrator deems appropriate.
 - (2) (A) identify, in terms of amounts of constituents and chemical, physical, and biological characteristics of pollutants, the degree of effluent reduction

attainable through the application of the best control measures and practices achievable including treatment techniques, process and procedure innovations, operating methods, and other alternatives for classes and categories of point sources (other than publicly owned treatment works); and

- (B) specify factors to be taken into account in determining the best measures and practices available to comply with subsection (b) (2) of section 1311 of this title to be applicable to any point source (other than publicly owned treatment works) within such categories or classes. Factors relating to the assessment of best available technology shall take into account the age of equipment and facilities involved, the process employed, the engineering aspects of the application of various types of control techniques, process changes, the cost of achieving such effluent reduction, non-water quality environmental impact (including energy requirements), and such other factors as the Administrator deems appropriate; and
- (3) Identify control measures and practices available to eliminate the discharge of pollutants from categories and classes of point sources, taking into account the cost of achieving such elimination of the discharge of pollutants.

Pollution discharge elimination procedures

(c) The Administrator, after consultation, with appropriate Federal and State agencies and other interested persons, shall issue to the States and appropriate water pollution control agencies within 270 days after October 18, 1972 (and from time to time thereafter) information on the processes, procedures, or operating methods which result in the elimination or reduction of the discharge of pollutants to implement standards of performance under section 1316 of this title. Such information shall include

technical and other data, including costs, as are available on alternative methods of elimination or reduction of the discharge of pollutants. Such information, and revisions thereof, shall be published in the Federal Register and otherwise shall be made available to the public.

Secondary treatment information; alternative waste treatment management techniques and systems

- (d) (1) The Administrator, after consultation with appropriate Federal and State agencies and other interested persons, shall publish within sixty days after October 18, 1972 (and from time to time thereafter) information, in terms of amounts of constituents and chemical, physical, and biological characteristics of pollutants, on the degree of effluent reduction attainable through the application of secondary treatment.
- (2) The Administrator, after consultation with appropriate Federal and State agencies and other interested persons, shall publish within nine months after October 18, 1972 (and from time to time thereafter) information on alternative waste treatment management techniques and systems available to implement section 1281 of this title.

Identification and evaluation of nonpoint sources of pollution; processes, procedures, and methods to control pollution

(e) The Administrator, after consultation with appropriate Federal and State agencies and other interested persons, shall issue to appropriate Federal agencies, the States, water pollution control agencies, and agencies designated under section 1288 of this title, within one year after October 18, 1972 (and from time to time thereafter) information including (1) guidelines for identifying and evaluating the nature and extent of nonpoint sources of pollutants, and (2) processes, procedures, and methods to control pollution resulting from—

- (A) agricultural and silvicultural activities, including runoff from fields and crop and forest lands;
- (B) mining activities, including runoff and siltation from new, currently operating, and abandoned surface and underground mines;
- (C) all construction activity, including runoff from the facilities resulting from such construction;
- (D) the disposal of pollutants in wells or in subsurface excavations;
- (E) salt water intrusion resulting from reductions of fresh water flow from any cause including extraction of ground water, irrigation, obstruction, and diversion; and
- (F) changes in the movement, flow, or circulation of any navigable waters or ground waters, including changes caused by the construction of dams, levees, channels, causeways, or flow diversion facilities.

Such information and revisions thereof shall be published in the Federal Register and otherwise made available to the public.

Guidelines for pretreatment of pollutants

(f) (1) For the purpose of assisting States in carrying out programs under section 1342 of this title, the Administrator shall publish, within one hundred and twenty days after October 18, 1972, and review at least annually thereafter and, if appropriate, revise guidelines for pretreatment of pollutants which he determines are not susceptible to treatment by publicly owned treatment works. Guidelines under this subsection shall be established to control and prevent the discharge into the navigable waters, the contiguous zone, or the ocean (either directly or through publicly owned treatment works) of any pollutant which

interferes with, passes through, or otherwise is incompatible with such works.

(2) When publishing guidelines under this subsection, the Administrator shall designate the category or categories of treatment works to which the guidelines shall apply.

Test procedure guidelines

(g) The Administrator shall, within one hundred and eighty days from October 18, 1972, promulgate guidelines establishing test procedures for the analysis of pollutants that shall include the factors which must be provided in any certification pursuant to section 1341 of this title or permit application pursuant to section 1342 of this title.

Guidelines for monitoring, reporting, enforcement, funding, personnel, and manpower

- (h) The Administrator shall (1) within sixty days after October 18, 1972, promulgate guidelines for the purpose of establishing uniform application forms and other minimum requirements for the acquisition of information from owners and operators of point-sources of discharge subject to any State program under section 1342 of this title, and (2) within sixty days from October 18, 1972, promulgate guidelines establishing the minimum procedural and other elements of any State program under section 1342 of this title which shall include:
 - (A) monitoring requirements;
 - (B) reporting requirements (including procedures to make information available to the public);
 - (C) enforcement provisions; and
 - (D) funding, personnel qualifications, and manpower requirements (including a requirement that no board or body which approves permit applications or

portions thereof shall include, as a member, any person who receives, or has during the previous two years received, a significant portion of his income directly or indirectly from permit holders or applicants for a permit.)

Restoration and enhancement of publicly owned fresh water lakes

(i) The Administrator shall, within 270 days after October 18, 1972 (and from time to time thereafter), issue such information on methods, procedures, and processes as may be appropriate to restore and enhance the quality of the Nation's publicly owned fresh water lakes.

Agreements with Secretaries of Agriculture, Army, and Interior to provide maximum utilization of programs to achieve and maintain water quality; transfer of funds; authorization of appropriations

- (j) (1) The Administrator shall, within six months from October 18, 1972, enter into agreements with the Secretary of Agriculture, the Secretary of the Army, and the Secretary of the Interior to provide for the maximum utilization of the appropriate programs authorized under other Federal law to be carried out by such Secretaries for the purpose of achieving and maintaining water quality through appropriate implementation of plans approved under section 1288 of this title.
- (2) The Administrator, pursuant to any agreement under paragraph (1) of this subsection is authorized to transfer to the Secretary of Agriculture, the Secretary of the Army, or the Secretary of the Interior any funds appropriated under paragraphs (3) of this subsection to supplement any funds otherwise appropriated to carry out appropriate programs authorized to be carried out by such Secretaries.

(3) There is authorized to be appropriated to carry out the provisions of this subsection, \$100,000,000 per fiscal year for the fiscal year ending June 30, 1973, and the fiscal year ending June 30, 1974.

§ 1316. National standards of performance—Definitions [Act § 306]

- (a) For purposes of this section:
- (1) The term "standard of performance" means a standard for the control of the discharge of pollutants which reflects the greatest degree of effluent reduction which the Administrator determines to be achievable through application of the best available demonstrated control technology, processes, operating methods, or other alternatives, including, where practicable, a standard permitting no discharge of pollutants.
- (2) The term "new source" means any source, the construction of which is commenced after the publication of proposed regulations prescribing a standard of performance under this section which will be applicable to such source, if such standard is thereafter promulgated in accordance with this section.
- (3) The term "source" means any building, structure, facility, or installation from which there is or may be the discharge of pollutants.
- (4) The term "owner or operator" means any person who owns, leases, operates, controls, or supervises a source.
- (5) The term "construction" means any placement, assembly, or installation of facilities or equipment (including contractual obligations to purchase such facilities or equipment) at the premises where such equipment will be used, including preparation work at such premises.

Categories of sources: Federal standards of performance for new sources

(b) (1) (A) The Administrator shall, within ninety days after October 18, 1972, publish (and from time to time thereafter shall revise) a list of categories of sources, which shall, at the minimum, include:

pulp and paper mills; paperboard, builders paper and board mills; meat product and rendering processing; dairy product processing; grain mills; canned and preserved fruits and vegetables processing; canned and preserved seafood processing; sugar processing; textile mills; cement manufacturing; feedlots: electroplating; organic chemicals manufacturing; inorganic chemicals manufacturing; plastic and synthetic materials manufacturing; soap and detergent manufacturing; fertilizer manufacturing; petroleum refining; iron and steel manufacturing; nonferrous metals manufacturing; phosphate manufacturing; steam electric powerplants; feroalloy manufacturing; leather tanning and finishing; glass and asbestos manufacturing; rubber processing; and timber products processing.

(B) As soon as practicable, but in no case more than one year, after a category of sources is included in a list

under subparagraph (A) of this paragraph, the Administrator shall propose and publish regulations establishing Federal standards of performance for new sources within such category. The Administrator shall afford interested persons an opportunity for written comment on such proposed regulations. After considering such comments, he shall promulgate, within one hundred and twenty days after publication of such proposed regulations, such standards with such adjustments as he deems appropriate. The Administrator shall, from time to time, as technology and alternatives change, revise such standards following the procedure required by this subsection for promulgation of such standards. Standards of performance, or revisions thereof, shall become effective upon promulgation. In establishing or revising Federal standards of performance for new sources under this section, the Administrator shall take into consideration the cost of achieving such effluent reduction, and any non-water quality environmental impact and energy requirements.

- (2) The Administrator may distinguish among classes, types, and sizes within categories of new sources for the purpose of establishing such standards and shall consider the type of process employed (including whether batch or continuous).
- (3) The provisions of this section shall apply to any new source owned or operated by the United States.

State enforcement of standards of performance

(c) Each State may develop and submit to the Administrator a procedure under State law for applying and enforcing standards of performance for new sources located in such State. If the Administrator finds that the procedure and the law of any State require the application and enforcement of standards of performance to at least the same extent as required by this section, such State is authorized to apply and enforce such standards of per-

formance (except with respect to new sources owned or operated by the United States).

Protection from more stringent standards

(d) Notwithstanding any other provision of this chapter, any point source the construction of which is commenced after October 18, 1972, and which is so constructed as to meet all applicable standards of performance shall not be subject to any more stringent standard of performance during a ten-year period beginning on the date of completion of such construction or during the period of depreciation or amortization of such facility for the purposes of section 167 or 169 (or both) of Title 26, whichever period ends first.

Illegality of operation of new sources in violation of applicable standards of performance

(e) After the effective date of standards of performance promulgated under this section, it shall be unlawful for any owner or operator of any new source to operate such source in violation of any standard of performance applicable to such source.

§ 1317. Toxic and pretreatment effluent standards; establishment; revision; illegality of source operation in violation of standards [Act § 307]

(a) (1) The Administrator shall, within ninety days after October 18, 1972, publish (and from time to time thereafter revise) a list which includes any toxic pollutant or combination of such pollutants for which an effluent standard (which may include a prohibition of the discharge of such pollutants or combination of such pollutants) will be established under this section. The Administrator in publishing such list shall take into account the toxicity of the pollutant, its persistence, degradability, the usual or potential presence of the affected organisms in any waters, the im-

portance of the affected organisms and the nature and extent of the effect of the toxic pollutant on such organisms.

- (2) Within one hundred and eighty days after the date of publication of any list, or revision thereof, containing toxic pollutants or combination of pollutants under paragraph (1) of this subsection, the Administrator, in accordance with section 553 of Title 5, shall publish a proposed effluent standard (or a prohibition) for such pollutant or combination of pollutants which shall take into account the toxicity of the pollutant, its persistence, degradability, the usual or potential presence of the affected organisms in any waters, the importance of the affected organisms and the nature and extent of the effect of the toxic pollutant on such organisms, and he shall publish a notice for a public hearing on such proposed standard to be held within thirty days. As soon as possible after such hearing, but not later than six months after publication of the proposed effluent standard (or prohibition), unless the Administrator finds. on the record, that a modification of such proposed standard (or prohibition) is justified based upon a preponderance of evidence adduced at such hearings, such standard (or prohibition) shall be promulgated.
- (3) If after a public hearing the Administrator finds that a modification of such proposed standard (or prohibition) is justified, a revised effluent standard (or prohibition) for such pollutant or combination of pollutants shall be promulgated immediately. Such standard (or prohibition) shall be reviewed and, if appropriate, revised at least every three years.
- (4) Any effluent standard promulgated under this section shall be at that level which the Administrator determines provides an ample margin of safety.
- (5) When proposing or promulgating any effluent standard (or prohibition) under this section, the Administrator shall designate the category or categories of sources to

which the effluent standard (or prohibition) shall apply. Any disposal of dredged material may be included in such a category of sources after consultation with the Secretary of the Army.

- (6) Any effluent standard (or prohibition) established pursuant to this section shall take effect on such date or dates as specified in the order promulgating such standard, but in no case more than one year from the date of such promulgation.
- (7) Prior to publishing any regulations pursuant to this section the Administrator shall, to the maximum extent practicable within the time provided, consult with appropriate advisory committees, States, independent experts, and Federal departments and agencies.
- (b) (1) The Administrator shall, within one hundred and eighty days after October 18, 1972, and from time to time thereafter, publish proposed regulations establishing pretreatment standards for introduction of pollutants into treatment works (as defined in section 1292 of this title) which are publicly owned for those pollutants which are determined not to be susceptible to treatment by such treatment works or which would interfere with the operation of such treatment works. Not later than ninety days after such publication, and after opportunity for public hearing, the Administrator shall promulgate such pretreatment standards. Pretreatment standards under this subsection shall specify a time for compliance not to exceed three years from the date of promulgation and shall be established to prevent the discharge of any pollutant through treatment works (as defined in section 1292 of this title) which are publicly owned, which pollutant interferes with, passes through, or otherwise is incompatible with such works.
- (2) The Administrator shall, from time to time, as control technology, processes, operating methods, or other

alternatives change, revise such standards following the procedure established by this subsection for promulgation of such standards.

- (3) When proposing or promulgating any pretreatment standard under this section, the Administrator shall designate the category or categories of sources to which such standard shall apply.
- (4) Nothing in this subsection shall affect any pretreatment requirement established by any State or local law not in conflict with any pretreatment standard established under this subsection.
- (c) In order to insure that any source introducing pollutants into a publicly owned treatment works, which source would be a new source subject to section 1316 of this title if it were to discharge pollutants, will not cause a violation of the effluent limitations established for any such treatment works, the Administrator shall promulgate pretreatment standards for the category of such sources simultaneously with the promulgation of standards of performance under section 1316 of this title for the equivalent category of new sources. Such pretreatment standards shall prevent the discharge of any pollutant into such treatment works, which pollutant may interfere with, pass through, or otherwise be incompatible with such works.
- (d) After the effective date of any effluent standard or prohibition or pretreatment standard promulgated under this section, it shall be unlawful for any owner or operator of any source to operate any source in violation of any such effluent standard or prohibition or pretreatment standard.

§ 1342. National pollutant discharge elimination system—Permits for discharge of pollutants [Act § 402]

(a) (1) Except as provided in sections 1328 and 1344 of this title, the Administrator may, after opportunity for public hearing, issue a permit for the discharge of any pollutant, or combination of pollutants, notwithstanding section 1311(a) of this title, upon condition that such discharge will meet either all applicable requirements under sections 1311, 1312, 1316, 1317, 1318, and 1343 of this title, or prior to the taking of necessary implementing actions relating to all such requirements, such conditions as the Administrator determines are necessary to carry out the provisions of this chapter.

- (2) The Administrator shall prescribe conditions for such permits to assure compliance with the requirements of paragraph (1) of this subsection, including conditions on data and information collection, reporting, and such other requirements as he deems appropriate.
- (3) The permit program of the Administrator under paragraph (1) of this subsection, and permits issued thereunder, shall be subject to the same terms, conditions, and requirements as apply to a State permit program and permits issued thereunder under subsection (b) of this section.
- (4) All permits for discharges into the navigable waters issued pursuant to section 407 of this title, shall be deemed to be permits issued under this title, and permits issued under this title shall be deemed to be permits issued under section 407 of this title, and shall continue in force and effect for their term unless revoked, modified, or suspended in accordance with the provisions of this chapter.
- (5) No permit for a discharge into the navigable waters shall be issued under section 407 of this title after October 18, 1972. Each application for a permit under section 407 of this title, pending on October 18, 1972, shall be deemed to be an application for a permit under this section. The Administrator shall authorize a State, which he determines has the capability of administering a permit program which will carry out the objective of this chapter, to issue permits for discharges into the navigable waters within the juris-

diction of such State. The Administrator may exercise the authority granted him by the preceding sentence only during the period which begins on October 18, 1972, and ends either on the ninetieth day after the date of the first promulgation of guidelines required by section 1314(h)(2) of this title, or the date of approval by the Administrator of a permit program for such State under subsection (b) of this section, whichever date first occurs, and no such authorization to a State shall extend beyond the last day of such period. Each such permit shall be subject to such conditions as the Administrator determines are necessary to carry out the provisions of this chapter. No such permit shall issue if the Administrator objects to such issuance.

State permit programs

(b) At any time after the propulgation of the guidelines required by subsection (h) (2) of section 1314 of this title, the Governor of each State desiring to administer its own permit program for discharges into navigable waters within its jurisdiction may submit to the Administrator a full and complete description of the program it proposes to establish and administer under State law or under an interstate compact. In addition, such State shall submit a statement from the attorney general (or the attorney for those State water pollution control agencies which have independent legal counsel), or from the chief legal officer in the case of an interstate agency, that the laws of such State, or the interstate compact, as the case may be, provide adequate authority to carry out the described program. The Administrator shall approve each such submitted program unless he determines that adequate authority does not exist:

(1) To issue permits which—

(A) apply, and insure compliance with, any applicable requirements of sections 1311, 1312, 1316, 1317, and 1343 of this title;

- (B) are for fixed terms not exceeding five years; and
- (C) can be terminated or modified for cause including, but not limited to, the following:
 - (i) violation of any condition of the permit;
 - (ii) obtaining a permit by misrepresentation, or failure to disclose fully all relevant facts;
 - (iii) change in any condition that requires either a temporary or permanent reduction or elimination of the permitted discharge;
 - (D) control the disposal of pollutants into wells;
- (2) (A) To issue permits which apply, and insure compliance with, all applicable requirements of section 1318 of this title, or
- (B) To inspect, monitor, enter, and require reports to at least the same extent as required in section 1318 of this title;
- (3) To insure that the public, and any other State the waters of which may be affected, receive notice of each application for a permit and to provide an opportunity for public hearing before a ruling on each such application;
- (4) To insure that the Administrator receives notice of each application (including a copy thereof) for a permit;
- (5) To insure that any State (other than the permitting State), whose waters may be affected by the issuance of a permit may submit written recommendations to the permitting State (and the Administrator) with respect to any permit application and, if any part of such written recommendations are not accepted by the permitting State, that the permitting State will notify such affected State (and the Administrator) in writing of its failure to so accept such recommendations together with its reasons for so doing;

- (6) To insure that no permit will be issued if, in the judgment of the Secretary of the Army acting through the Chief of Engineers, after consultation with the Secretary of the department in which the Coast Guard is operating, anchorage and navigation of any of the navigable waters would be substantially impaired therby;
- (7) To abate violations of the permit or the permit program, including civil and criminal penalties and other ways and means of enforcement;
- (8) To insure that any permit for a discharge from a publicly owned treatment works includes conditions to require adequate notice to the permitting agency of (A) new introductions into such works of pollutants from any source which would be a new source as defined in section 1316 of this title if such source were discharging pollutants, (B) new introductions of pollutants into such works from a source which would be subject to section 1311 of this title if it were discharging such pollutants, or (C) a substantial change in volume or character of pollutants being introduced into such works by a source introducing pollutants into such works at the time of issuance of the permit. Such notice shall include information on the quality and quantity of effluent to be introduced into such treatment works and any anticipated impact of such change in the quantity or quality of effluent to be discharged from such publicly owned treatment works; and
- (9) To insure that any industrial user of any publicly owned treatment works will comply with sections 1284(b), 1317, and 1318 of this title.

Suspension of federal program upon submission of State program: withdrawal of approval of State program

(c) (1) Not later than ninety days after the date on which a State has submitted a program (or revision thereof) pursuant to subsection (b) of this section, the Administrator shall suspend the issuance of permits under sub-

section (a) of this section as to those navigable waters subject to such program unless he determines that the State permit program does not meet the requirements of subsection (b) of this section or does not conform to the guidelines issued under section 1314(h) (2) of this title. If the Administrator so determines, he shall notify the State of any revisions or modifications necessary to conform to such requirements or guidelines.

- (2) Any State permit program under this section shall at all times be in accordance with this section and guidelines promulgated pursuant to section 1314(h) (2) of this title.
- (3) Whenever the Administrator determines after public hearing that a State is not administering a program approved under this section in accordance with requirements of this section, he shall so notify the State and, if appropriate corrective action is not taken within a reasonable time, not to exceed ninety days, the Administrator shall withdraw approval of such program. The Administrator shall not withdraw approval of any such program unless he shall first have notified the State, and made public, in writing, the reasons for such withdrawal.

Notification of Administrator

- (d) (1) Each State shall transmit to the Administrator a copy of each permit application received by such State and provide notice to the Administrator of every action related to the consideration of such permit application, including each permit proposed to be issued by such State.
- (2) No permit shall issue (A) if the Administrator within ninety days of the date of his notification under subsection (b) (5) of this section objects in writing to the issuance of such permit, or (B) if the Administrator within ninety days of the date of transmittal of the proposed permit by the State objects in writing to the issuance of such permit as being outside the guidelines and requirements of this chapter.

(3) The Administrator may, as to any permit application, waive paragraph (2) of this subsection.

Waiver of notification requirement

(e) In accordance with guidelines promulgated pursuant to subsection (h) (2) of section 1314 of this title, the Administrator is authorized to waive the requirements of subsection (d) of this section at the time he approves a program pursuant to subsection (b) of this section for any category (including any class, type, or size within such category) of point sources within the State submitting such program.

Point source categories

(f) The Administrator shall promulgate regulations establishing categories of point sources which he determines shall not be subject to the requirements of subsection (d) of this section in any State with a program approved pursuant to subsection (b) of this section. The Administrator may distinguish among classes, types, and sizes within any category of point sources.

Other regulations for safe transportation, handling, carriage, storage, and stowage of pollutants

(g) Any permit issued under this section for the discharge of pollutants into the navigable waters from a vessel or other floating craft shall be subject to any applicable regulations promulgated by the Secretary of the department in which the Coast Guard is operating, establishing specifications for safe transportation, handling, carriage, storage, and stowage of pollutants.

Violation of permit conditions: restriction or prohibition upon introduction of pollutant by source not previously utilizing treatment works

(h) In the event any condition of a permit for discharges from a treatment works (as defined in section 1292 of this title) which is publicly owned is violated, a State with a program approved under subsection (b) of this section or the Administrator, where no State program is approved, may proceed in a court of competent jurisdiction to restrict or prohibit the introduction of any pollutant into such treatment works by a source not utilizing such treatment works prior to the finding that such condition was violated.

Federal enforcement not limited

(i) Nothing in this section shall be construed to limit the authority of the Administrator to take action pursuant to section 1319 of this title.

Public information

(j) A copy of each permit application and each permit issued under this section shall be available to the public. Such permit application or permit, or portion thereof, shall further be available on request for the purposes of reproduction.

Compliance with permits

(k) Compliance with a permit issued pursuant to this section shall be deemed compliance, for purposes of sections 1319 and 1365 of this title, with sections 1311, 1312, 1316, 1317, and 1343 of this title, except any standard imposed under section 1317 of this title for a toxic pollutant injurious to human health. Until December 31, 1974, in any case where a permit for discharge has been applied for pursuant to this section, but final administrative disposition of such application has not been made, such discharge shall not be a violation of (1) section 1311, 1316, or 1342

of this title, or (2) section 407 of this title, unless the Administrator or other plaintiff proves that final administrative disposition of such application has not been made because of the failure of the applicant to furnish information reasonably required or requested in order to process the application. For the 180-day period beginning on October 18, 1972, in the case of any point source discharging any pollutant or combination of pollutants immediately prior to such date of enactment which source is not subject to section 407 of this title, the discharge by such source shall not be a violation of this chapter if such a source applies for a permit for discharge pursuant to this section within such 180-day period.

APPENDIX C

Regulations Involved

EPA's regulations for the Petroleum Refining Point Source Category are at 40 C.F.R. § 419. Pertinent to this case are the identical preambles ("variance clauses") included in §§ 419.12, 419.22, 419.32, 419.42 and 419.52. Each reads as follows:

In establishing the limitations set forth in this section, EPA took into account all information it was able to collect, develop and solicit with respect to factors (such as age and size of plant, raw materials, manufacturing processes, products, produced, treatment technology available, energy requirements and costs) which can affect the industry subcategorization and effluent levels established. It is, however, possible that data which would affect these limitations have not been available and, as a result, these limitations should be adusted for certain plants in this industry. An individual discharger or other interested person may submit evidence to the Regional Administrator (or to the State, if the State has the authority to issue NPDES permits) that factors relating to the equipment or facilities involved, the process applied, or other such factors related to such discharger are fundamentally different from the factors considered in the establishment of the guidelines. On the basis of such evidence or other available information, the Regional Administrator (or the State) will make a written finding that such factors are or are not fundamentally different for that facility compared to those specified in the Development Document. If such fundamentally different factors are found to exist, the Regional Administrator or the State shall establish for the discharger effluent limitations in the NPDES permit either more or less stringent than the limitations

established herein to the extent dictated by such fundamentally different factors. Such limitations must be approved by the Administrator of the Environmental Protection Agency. The Administrator may approve or disapprove such limitations, specify other limitations, or initiate proceedings to revise these regulations.